



Draft Final

U.S. Army Corps of Engineers  
RCRA Facility Investigation  
Oro Grande Landfill (SWMU25/FTBL-14)

January 2009

5285-027

**MALCOLM  
PIRNIE**

INDEPENDENT ENVIRONMENTAL  
ENGINEERS, SCIENTISTS  
AND CONSULTANTS  
1798/2018



U.S. Army Corps of Engineers

Draft Final

# RCRA Facility Investigation Report

## Oro Grande Landfill (SWMU25/FTBL-14)

Contract No: W912BV-04-D-2008

Task Order 007, Modification 02

January 2009

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**U.S. Army Corps of Engineers**

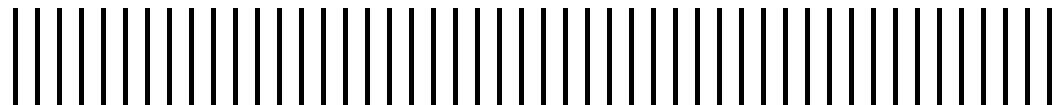
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# **Resource Conservation and Recovery Act Facility Investigation Report**

## **Oro Grande Landfill (SWMU-25/FTBL-14)**

January 2009



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## List of Acronyms

°F	Degrees Fahrenheit
ASTM	American Society for Testing and Materials
bgs	Below ground surface
BISON-M	Biota Information System of New Mexico
CCVs	Continuing calibration verifications
CERCLA	Comprehensive Environmental Response, Compensation, and Liability Act
cm/s	Centimeters per second
COCs	Chemicals of concern
CSM	Conceptual site model
DRI	Desert Research Institute
ED	Environment Division
F14-SB	Fort Bliss 14 soil boring
FTBL	Fort Bliss Landfill
ft/day	Feet per day
GC	Gas chromatograph
GC/MS	Gas chromatograph/mass spectrometry
GFAA	Graphite furnace atomic absorption
ICP	Inductively coupled plasma spectroscopy
ICS	Interference check sample
IDW	Investigation-derived waste
LCS	Laboratory control sample
LCSD	Laboratory control sample duplicate
lbs/ft <sup>3</sup>	Pounds per feet cubed
LULC	Land use and land cover maps
MDL	Method detection limit
meq/100g	Millequivalents per 100 grams
mg/kg	Milligrams per kilogram
mL	Milliliters
MOD 01	Modification 01
NMED	New Mexico Environment Department
NMFD	New Mexico Forestry Division
NMGF	New Mexico Department of Game and Fish
PCB	Polychlorinated biphenyls



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PCSEM	Preliminary conceptual site exposure model
PID	Photoionization detector
ppm	Parts per million
QA	Quality assurance
QC	Quality control
QCR	Quality control report
RAGS	Risk Assessment Guidance for Superfund
RCRA	Resource Conservation and Recovery Act
RFI	RCRA Facility Investigation
RL	Reporting limit
SL	Screening level
SLERA	Screening Level Ecological Risk Assessment
SSL	Soil screening level
SVOC	Semivolatile organic compound
SWMUs	Solid Waste Management Units
TD	Total depth
Tetra Tech	Tetra Tech EM, Inc.
TPG	Thompson Professional Group, Inc.
TPH	Total petroleum hydrocarbons
TPH-DRO	Total petroleum hydrocarbons – diesel range organics
US	United States
USACE	U.S. Army Corps of Engineers
USBLM	U.S. Bureau of Land Management
USDA	U.S. Department of Agriculture
USEPA	U.S. Environmental Protection Agency
USFS	U.S. Forest Service
USGS	United States Geological Survey
VOC	Volatile organic compound
Wagner	J.K. Wagner & Company, Inc.

# Executive Summary

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The United States Army Corps of Engineers, Tulsa District, contracted with Malcolm Pirnie under Contract W912BV-04-D-2008, Task Order 007, Modification 02 (MOD 02) to conduct a Resource Conservation and Recovery Act (RCRA) Facility Investigation (RFI) at the Oro Grande Landfill (Solid Waste Management Unit (SWMU) -25/ Fort Bliss Landfill (FTBL)-14).

The Oro Grande Range Camp is situated in Otero County, New Mexico within the Fort Bliss Military Reservation. The Oro Grande Landfill is located 0.8 miles south-southwest of the Oro Grande Range Camp at the southwest edge of Elephant Mountain in the Tularosa Basin of New Mexico. The landfill was constructed in 1964 to provide a waste disposal facility to service the Oro Grande Range Camp. The landfill reportedly contained approximately 600 cubic yards of waste material when it was closed in 1994. The Oro Grande Landfill has not been used since 1994.

The landfill was reportedly constructed using a single trench approximately 370 feet long by 20 to 65 feet wide at a depth of 9 to 12 feet below ground surface (bgs). The trench was excavated out of native soil, unlined, and capped with native soil.

The scope and objectives of this RFI were as follows:

- Verify the lateral extent of the wastes.
- Determine whether chemicals of concern (COCs) have been released to the soil at concentrations above the New Mexico Environment Department (NMED) Residential Soil Screening Levels (SSLs-Residential).
- Evaluate the potential for a groundwater pathway.
- Determine the characteristics of the on-site soils for use as landfill cover material.

Field activities were conducted in accordance with the NMED-approved RCRA Facility Investigation Work Plan dated November 27, 2007. Investigation activities completed during the RFI included an initial site survey, exploratory trenching, a surface and subsurface soil investigation and sampling, a Screening Level Ecological Risk Assessment (SLERA) Phase I Scoping Assessment, and a final site survey. Exploratory trenches were completed at the landfill to verify the extent of wastes. Analytical results of samples collected during the surface and subsurface investigation were compared to the SSLs-Residential, the United States Environmental Protection Agency (USEPA) Region 6 Residential Screening Levels (SLs), and background concentrations.



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## Summary of Findings

The following summary of conclusions is based on the findings of the investigation activities conducted during the RFI:

- Buried wastes observed at the Oro Grande Landfill consisted of concrete, glass, building materials, plastic, wiring, packaging materials, and demolition debris.
- Cover material observed in the exploratory trenches consists of poorly-graded sand with clay, silty sand, and clayey sand with a thickness ranging from 1 to 10 feet with an average thickness of approximately 4.6 feet.
- The extent of buried waste is approximately 345 feet by 37 feet with an estimated surface area of 0.29 acres.
- The average observed thickness of the buried waste layer in the exploration trenches is approximately 2.8 feet. Waste thicknesses up to 10 feet were observed. The estimated volume of the buried waste is approximately 2,300 cubic yards based on the observed average thickness of 2.8 feet.
- Native materials below the buried wastes consist of sand with gravel and interbedded layers of caliche to a depth of approximately 30 feet bgs, silty sand to 116.5 feet bgs.
- Saturated conditions were not observed at the Oro Grande Landfill between ground surface and 116.5 feet bgs.
- No evidence of a release of COCs from the buried wastes was detected. The single detection of a COC above NMED SSL-Residential values was arsenic in a sample collected from 28-30 feet bgs. This arsenic detection of 4.01 mg/kg is below the published USEPA Region 6 background concentration.
- Surficial soils at the Oro Grande Landfill have a measured hydraulic conductivity of approximately  $1.6 \times 10^{-4}$  centimeters per second (cm/s). This indicates that the native surficial material does not meet the NMED *Closure and Post-Closure Care Plan* requirement for landfill cover material with a saturated hydraulic conductivity less than  $1 \times 10^{-5}$  cm/sec.
- No completed exposure pathways to potential human or ecological receptors were identified because no releases of COCs were observed.

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## Recommendations

Malcolm Pirnie recommends that Fort Bliss prepare and submit a request for a Class 3 permit modification to NMED to remove the Oro Grande Landfill (SWMU-25/FTBL-14) from the requirement to conduct corrective action pursuant to their RCRA permit. The Oro Grande Landfill is listed on Table 2 of the RCRA Permit No.: NM4213720101-01 issued to the United States Army Air Defense Center and Fort Bliss, New Mexico. Table 2 is the List of Solid Waste Management Units and Areas of Concern Requiring Corrective Action. The recommended permit modification will request moving the Oro Grande Landfill from Table 2 to Table 3 in the RCRA permit. Table 3 is the List of Solid Waste Management Units and Areas of Concern Not Currently Requiring Corrective Action.

The basis for the permit modification request is the RFI which demonstrates that no release of COCs has occurred. NMED's determination of No Further Action is based on Fort Bliss' demonstration that no additional corrective action is required to protect human health and the environment. NMED considers five general criteria to determine whether NFA is appropriate. NFA is appropriate for the Oro Grande Landfill because it meets NMED NFA Criteria 3: *"No release to the environment has occurred or is likely to occur in the future from the SWMU/AOC"*

The request for the Class 3 permit medication will also involve public notice and a public comment period.

Should NMED grant the permit modification and No Further Action status for the landfill, Fort Bliss should then seek to close the landfill in accordance with *Solid Waste Facility and Composting Facility Closure and Post Closure Requirements* under the New Mexico Administrative Code (20 NMAC 9.VI).

An evaluation should be conducted of potential closure options under the NMED solid waste regulations for the buried waste observed at the Oro Grande Landfill. These closure options would include closure in-place and removal of the buried waste. Closure in-place would require the design and installation of a cover system meeting the NMED closure requirements for a municipal landfill. Removal of the buried wastes would involve excavation, loading, and off-site transport of the wastes to a permitted landfill facility. The evaluation of potential remedial options should include an engineering evaluation and analysis of potential costs.

While the trenches excavated during the RFI activities delineated the lateral extent of the buried wastes, the trenches did not, in most cases, extend to the center of the landfill. Additional trenching should be conducted to obtain information regarding the thickness of the buried waste and the thickness of the cover material. This information will be needed for the design and costing of potential closure options.

# 1. Introduction

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## 1.1. Project Background

This RFI report documents site investigations and analytical results at the Oro Grande Landfill (SWMU-25/FTBL-14) located in Otero County, New Mexico, within the Fort Bliss Military Reservation. This RFI report was prepared by Malcolm Pirnie for the United States (U.S.) Army Corps of Engineers, Tulsa District under Contract W912BV-04-D-2008, Task Order 007, MOD 02.

## 1.2. Scope and Objectives

The scope and objectives of this RFI were as follows:

- Verify the lateral extent of the wastes.
- Determine whether COCs have been released to the soil at concentrations above the NMED SSLs-Residential.
- Evaluate the potential for a groundwater pathway.
- Determine the characteristics of the on-site soils for use as landfill cover material.

The RFI was conducted in accordance with the NMED-approved RFI Work Plan dated November 2007. NMED provided concurrence with the RFI Work Plan in a letter to the Fort Bliss Directorate of Public Works, Environmental Division (ED), dated December 20, 2007. Fort Bliss provided the requested notification of field activities in a letter from the ED to NMED dated January 10, 2008. The data collected during the field activities have been incorporated into this RFI document to support an evaluation of corrective measure alternatives, if required, or to support closure of the landfill.

## 1.3. Regulatory Framework

The NMED and the USEPA Region 6 have entered into a joint permitting agreement. Pursuant to this agreement, United States Army Air Defense Artillery Center and Fort Bliss was issued Permit NM4213720101-01, a RCRA Hazardous and Solid Waste Act (HSWA) Subpart X permit, on July 21, 1995 which required RCRA Facility Investigations of nine solid waste management units (SWMUs) located on military property in New Mexico. The United States Army Air Defense Center and Fort Bliss are located on approximately 1.2 million acres of land in far west Texas and southern New Mexico. Fort Bliss encompasses portions of two states and three counties (Dona Ana and Otero counties in New Mexico and El Paso County in Texas). The Installation is an



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active training facility and is under the U.S. Army Training and Doctrine Command with a primary mission of air defense.

Under RCRA Permit NM4213720101-01, NMED can approve or deny hazardous waste permits, closure plans, permit modifications, and amendments in New Mexico in accordance with the New Mexico Hazardous and Solid Waste Management Act (Section 74-4-1 et seq., NMSA 1978, as amended, 1992), the New Mexico Hazardous Waste Management Regulations (20.4.1 NMAC), and the Solid Waste Disposal Act as amended by the RCRA [42 U.S.C. 6901, et seq.].

During the RCRA permitting process, Oro Grande Landfill SWMU-25/ FTBL-14 was listed on Table B-1 of RCRA Permit NM4213720101-01. Table B-1 is a list of active Fort Bliss sites requiring annual auditing by NMED. Prior to 1995, the Oro Grande Landfill was an un-permitted landfill.

RCRA Permit NM4213720101-01 expired on July 8, 2005. In June 2005, Fort Bliss submitted an application for a Corrective Actions Only Permit for the SWMUs that were not yet closed. This permit application included SWMU-25/FTBL-14. SWMU-25/FTBL-14 was not included in any other permits.

NMED Closure Criterion 5 states:

*“The Solid Waste Management Unit or Area of Concern has been characterized or remediated in accordance with the current applicable state or federal regulations, and the available data indicate that contaminants pose an acceptable level of risk under current and projected future land use.”*

Fort Bliss will submit this RFI Report resulting from the implementation of the approved RFI Work Plan (November 2007) to NMED in accordance with the Corrective Actions Only Permit. NMED will review the RFI Report to determine whether Fort Bliss has adequately characterized SWMU-25/FTBL-14. If further investigation or other corrective action is required, Fort Bliss will request additional funding to perform the required investigation / corrective action activities. If further investigation or other corrective action is not required, NMED will recommend that Fort Bliss submit a petition for a Corrective Action Complete determination. NMED will then respond to the petition as appropriate. Should NMED grant a No Further Action status for the landfill, Fort Bliss will then seek to close the landfill in accordance with *Solid Waste Facility and Composting Facility Closure and Post Closure Requirements* under the New Mexico Administrative Code (20 NMAC 9.VI).

## **1.4. Site Background and Setting**

### **1.4.1. Site Location and Description**

The Oro Grande Landfill is located 0.8 miles southeast of the Oro Grande Range Camp at the southwest edge of Elephant Mountain in the Tularosa Basin of New Mexico. The site location is illustrated on Figure 1-1. The Oro Grande Range Camp is situated in Otero County within the Fort Bliss Military Reservation, which covers approximately 1.2 million acres of land in New Mexico and Texas near El Paso, Texas.

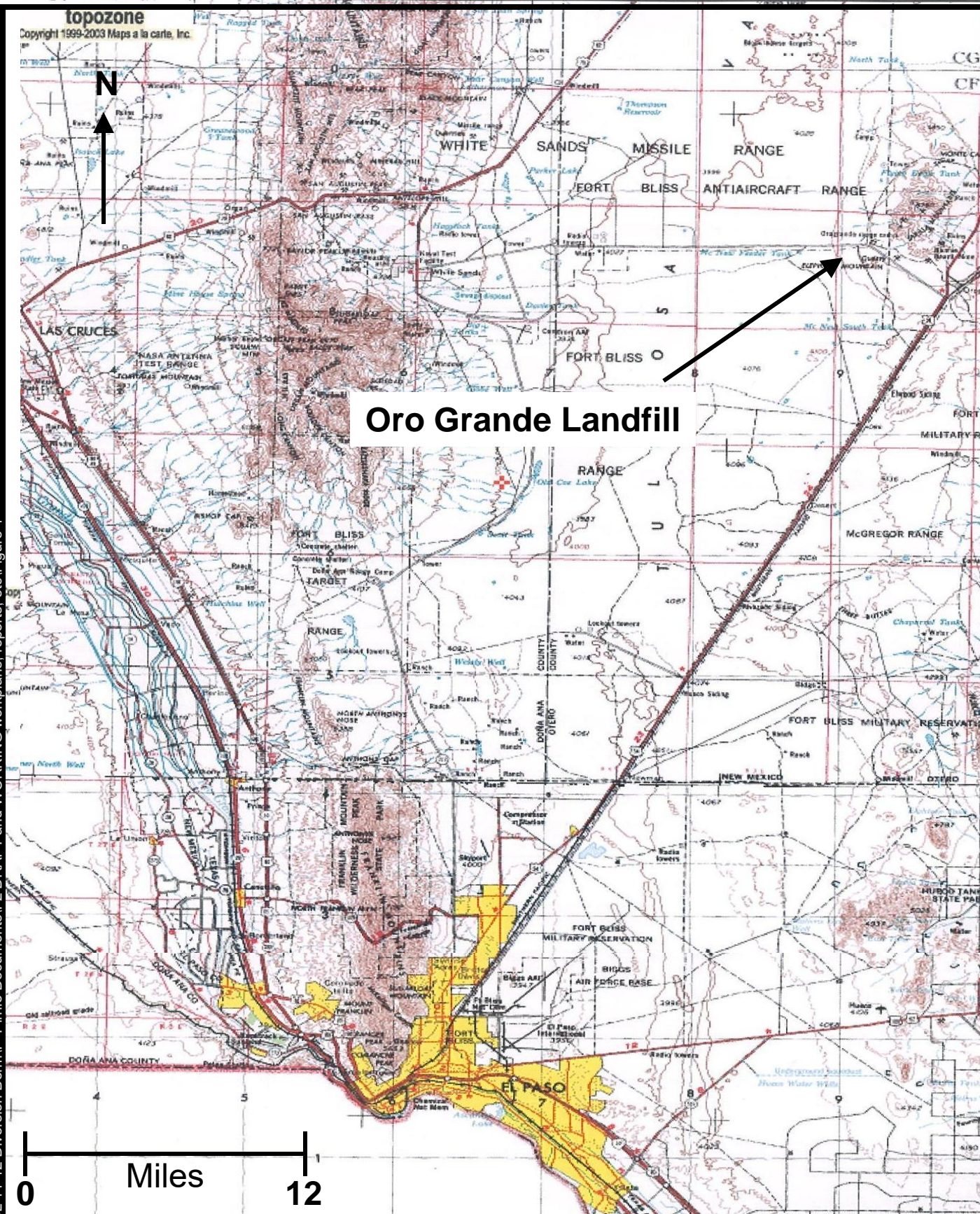
### **1.4.2. Site Background**

The land for the Oro Grande Range Camp was acquired sometime after 1938. A greater amount of range camp land was needed due to the increased use of anti-aircraft weapons and the resultant training programs.

In 1949, Oro Grande Range Camp facilities consisted of a salt water well (depth unknown) for washing, trucked-in drinking water stored in a cistern, a septic tank for sewage with capacity for a population of 2,000 troops, an evaporation pool, 10 mess halls, 10 latrine buildings, 20 accessory buildings, and tents for troops. In 1950, the range camp added a post-exchange building, three range buildings, a caretaker's quarters, two storehouses, and a classroom. In 1962, the range camp was rebuilt due to increased usage by U.S. and North Atlantic Treaty Organization troops. The original buildings were demolished and new semi-permanent masonry or sheet metal buildings were constructed to accommodate approximately 1,000 troops. Water for the newly-constructed site was provided via pipeline from the White Sands Missile Range (Wagner, 2000).

Operations at the landfill commenced around 1964. The contents of the landfill occasionally were burned. The landfill was closed in 1994 (Wagner, 2000).





## Oro Grande Landfill

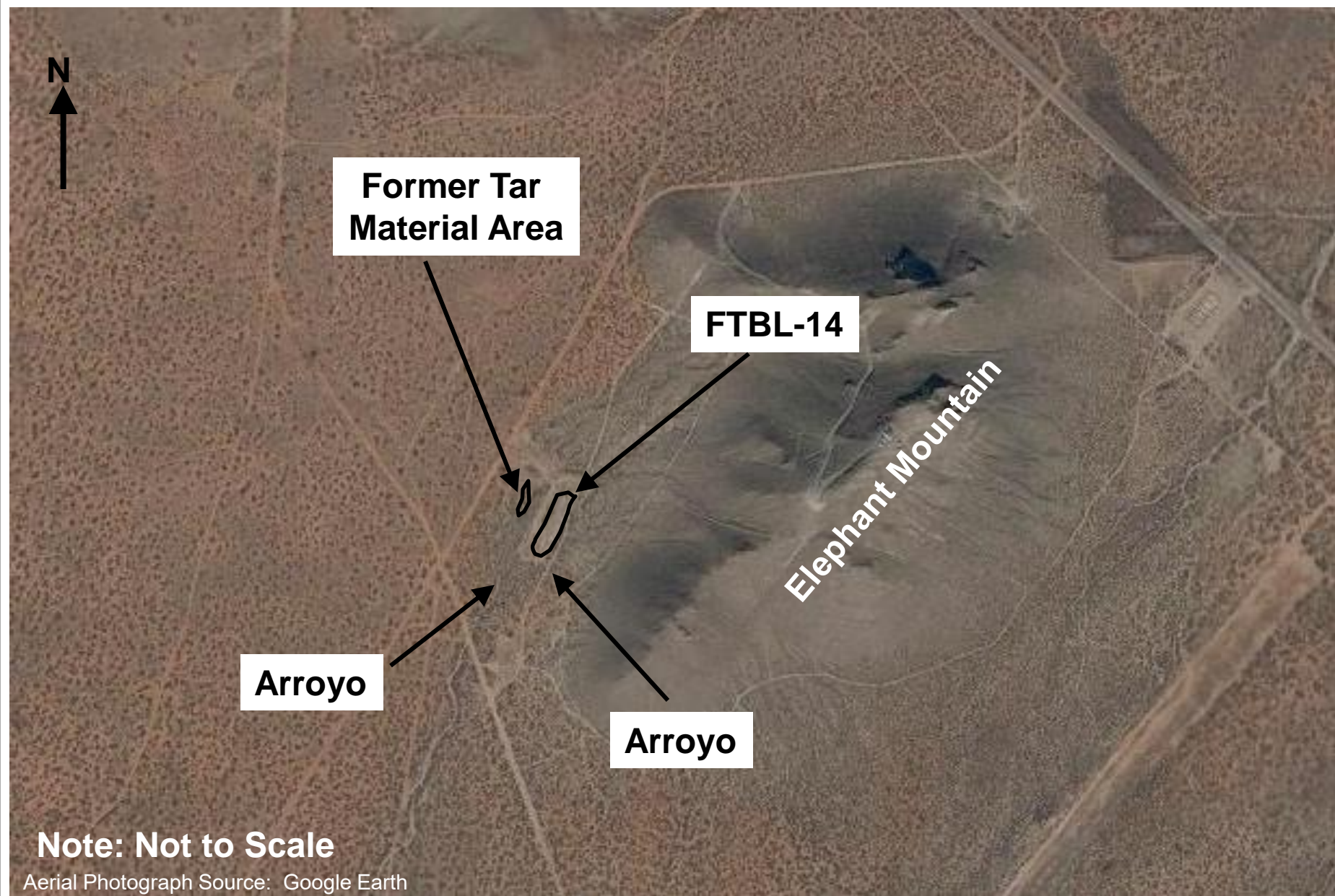


The disturbed area of the landfill covered approximately 2 acres. TPG (1997) reported that the waste trench was approximately 370 feet long by 20 to 65 feet wide with a depth of 9 to 12 feet bgs. Based on these dimensions, the landfill capacity would have been approximately 10,700 cubic yards. TPG's dimensions were based on the data collected from a geophysical survey using frequency-domain electromagnetic, magnetometry, and ground penetrating radar techniques followed by excavation of an exploratory trench (TPG, 1997). Based on interviews, Wagner (2000) reported that the landfill contained two parallel trenches about 2 feet apart, which were approximately 120 feet long by 22 feet wide and 15 feet deep. Based on these dimensions the landfill capacity for the two trenches would have been approximately 2,900 cubic yards. Figure 1-2 presents an aerial view of the site.

Wagner (2000) further reported that approximately 600 cubic yards of waste material were present in the landfill at the end of operation in 1994. Thus, the reported amount of waste present in the landfill in 1994 was lower than both the estimated landfill capacities. It was unknown whether the remaining capacity was used for daily or intermediate waste covers or if the landfill was closed below its total estimated capacity.

The Oro Grande Landfill was excavated out of native soil, unlined, and capped with native soil. The landfill was described as consisting of a hard packed clay caliche pit and rock walls with a hard packed clay and sand floor (Wagner, 2000). However, this description does not correspond to the soil types described by the U.S. Department of Agriculture (USDA) (1975) or the boring logs prepared by TPG (1997).

Based on the report by Wagner (2000), workers familiar with the range camp landfills were interviewed concerning the items that may have been disposed of at the landfill. Asbestos, paint, paint thinner, gasoline, used automobile oil, automobile grease, spent cartridges, and roofing materials may have been disposed of at Oro Grande Landfill. However, according to TPG (1997), no hazardous wastes or unexploded ordnance (UXO) was reported to have been disposed of at the Oro Grande Landfill. TPG (1997) identified the following contents at the Oro Grande Landfill based on trenching activities: field communications wire, construction materials, plastic sheeting and garbage bags, plant debris, asphalt, tar paper, metal items, a toilet, household refuse.



The cap on the landfill is composed of native soil. According to TPG, the thickness of the landfill cap varies from 5 to 7 feet. A visual inspection completed by TPG (1997) reported that the cap does not appear to meet the requirements of the New Mexico Solid Waste Bureau. They reported that a “large area of the trench cover has subsided below the grade of the surrounding surface.”

Tar material was disposed of on the ground surface in an arroyo to the west of the landfill. TPG (1997) described this as the “TAR MATERIAL AREA”. Over time, the tar disintegrated into small pieces, which were dispersed in the arroyo during storm events. Fort Bliss conducted removal activities related to the dispersed tar in 2004 and disposed of the material in a permitted landfill.

Historical aerial photographs available for Oro Grande Landfill were provided in the report written by Wagner (2000). Historical aerial photographs available are from the years 1985, 1987, and 1998 (Appendix A). These aerial photographs show evidence of the landfill but little information can be interpreted from the photographs because of their large scale.

### **1.4.3. Environmental Setting**

#### **TOPOGRAPHY**

The Oro Grande Landfill is situated at an approximate elevation of 4,240 feet above mean sea level. The terrain around the landfill generally slopes to the southwest. Arroyos are located east and west of the landfill. Figure 1-1 is a U.S. Geological Survey (USGS) digital topographic map displaying the physical environment of the area. The arroyos appear to have been naturally formed by the surface runoff from infrequent rainfall events, as shown on Figure 1-2.

#### **SOILS**

The soil type at the landfill is designated Pendero fine sand. The Pendero series is described as a reddish brown loamy fine sand and is eolian in origin. The soil is described as having 2% to 5% slopes. Pendero soils are excessively drained and have low water capacity. Pendero fine sand contains 5% calcium carbonate and is considered moderately alkaline. The soil is typically 80 inches thick. Pendero fine sand can support desert shrub type vegetation and is generally used for livestock grazing. (USDA, 2007).

#### **CLIMATE**

The Oro Grande Landfill is located in Otero County which is described as having a climate that is more moderate than other desert areas because of its high elevation and proximity to a mountain range. Prevailing wind direction in the area is from the southwest.



Daytime high temperatures range from an average high of 57 degrees Fahrenheit (°F) in January to an average high of 95°F in July. The average daily low temperatures range between 27°F in January and 65°F in July (Desert Research Institute (DRI), 2005).

The average annual rainfall is approximately 10 inches, with the driest month usually being April. Occasional rainless periods of several months are not uncommon. August is typically the wettest month with an average about 2 inches of rainfall (DRI, 2005).

## ***SURFACE WATER***

Arroyos are located between the east side of the landfill and the foot of Elephant Mountain and to the west side of the landfill. Storm water in the arroyos generally flows to the south-southwest (Figure 1-2).

### **1.4.4. Regional Geology**

Otero County, New Mexico is considered the easternmost edge of the Basin and Range province (O'Neill, 1998). Geologically, the Fort Bliss Military Reservation is located within the Tularosa Basin and Hueco Bolson of the New Mexico Highland section of the Basin and Range province. A groundwater divide separates the two basins hydrogeologically. The Sacramento and Hueco Mountains lie to the east of the basins and the San Andres-Organ-Franklin Mountain chain lies to the west. The Oro Grande Landfill is situated 0.8 miles south-southwest of the Oro Grande Range Camp at the southwest edge of Elephant Mountain at an approximate elevation of 4,240 feet above mean sea level.

Subsurface soils in this portion of the basin are dry unconsolidated basin fill deposits of fine-grained sand, silt, caliches, and clays. The basin fill may range in thickness up to 8,000 feet. A review of the TPG (1997) soil borings and the 2008 RFI soil borings indicates that the subsurface soils consist of sand and gravel with lenses of compacted chalky caliche that were encountered at depths of 14 to 15 feet bgs and 30 to 34 feet bgs. Underlying the sand and caliche is a layer of silty-sand that extends to a depth of 85 feet bgs where a 6 inch layer of dense clay was observed. Underlying the clay layer was a layer of silty-sand that extends to a depth of 116.5 feet bgs.

### **1.4.5. Regional Hydrogeology**

Regional groundwater in the area of the Oro Grande Landfill is expected to occur between approximately 250 and 500 feet bgs (USGS, 1974). Groundwater was not observed in any of the borings completed at the Oro Grande Landfill site to a depth of 116.5 feet bgs. Groundwater was also not observed in soil borings completed to a depth of 319.5 feet bgs during a 1998 investigation at the Oro Grande oxidation lagoon located approximately one mile north of the Oro Grande Landfill.

The groundwater quality in the regional aquifer is reported to be non-potable due to high total dissolved solids. Groundwater in the Tularosa Basin generally flows to the south. However, the Tularosa and Hueco Basins are hydrogeologically separated by a divide on the border of Texas and Mexico (Texas Department of Water Resources). The bedrock that underlies the basin is relatively impermeable and does not supply large quantities of water to wells.

The primary recharge source for the basin aquifer is percolation of rainfall and surface water through coarse alluvial fan deposits near the base of the mountains. Caliche occurs nearly everywhere beneath the surface of the basin and is relatively effective as a barrier to infiltration from rainfall (Fort Bliss Mission and Master Plan, 1999).

#### **1.4.6. Groundwater Usage**

Groundwater in Otero County is used primarily for irrigation. Drinking water for the Oro Grande Range Camp is piped in from the White Sands Missile Range Headquarters. Drinking water for the nearby town of Oro Grande, New Mexico, is piped in from the Sacramento Mountains to the north and east.

No potable water wells have been completed in the uppermost groundwater zone within one-half mile of the Oro Grande Landfill.

#### **1.4.7. Land Use**

The current and future surrounding land use is a military range. No unauthorized human use of the landfill and the Oro Grande Range Camp is allowed.

## 2. Investigation Methods

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### 2.1. Site Preparation and Site Access

Malcolm Pirnie completed the following procedures to gain access to the Oro Grande Landfill:

1. Contacted Kelly Blough of the Fort Bliss ED who completed and submitted Form IAW AR 415-15 (Excavation Request) to the Directorate of Public Works.
2. Contacted Mr. Shane Offutt of the Fort Bliss ED to coordinate site access, vehicle passes, and UXO briefing. Requirements for personnel and vehicle access were government issued identification, proof of vehicle insurance, and valid vehicle registration for each person or vehicle requiring access to the site.
3. Provided personnel and vehicle information to David Black, McGregor Range Control.
4. Met with David Black at McGregor Camp Range Office. Attended a UXO briefing conducted by Mr. Black, registered vehicles with Range Office, and received vehicle permits for each vehicle.
5. Called Range Control daily to receive site access and inform of departure.

### 2.2. Field Activities

#### 2.2.1. Initial Site Survey

Under the direction of Malcolm Pirnie, Cutts Land Surveying, a New Mexico licensed surveyor, used available landmarks to survey the maximum probable extent of waste as identified by the high terrain conductivity line of the TPG geophysical survey (1997) Figure 2-1. On February 12, 2008, the boundary locations were marked with wooden stakes and flagging every 50 feet where each of the surveyed grid-lines intersected the extent of high terrain conductivity line.

#### 2.2.2. Exploratory Trenching

On February 12-13, 2008, D&H Pump Service, Inc. under the direction of Malcolm Pirnie, completed 15 exploratory trenches using a John Deere 510 D backhoe to verify the maximum extent of waste at the boundary of the area identified as high terrain conductivity by the TPG geophysical survey (1997). The positions of exploratory trenches are indicated on Figure 2-1.

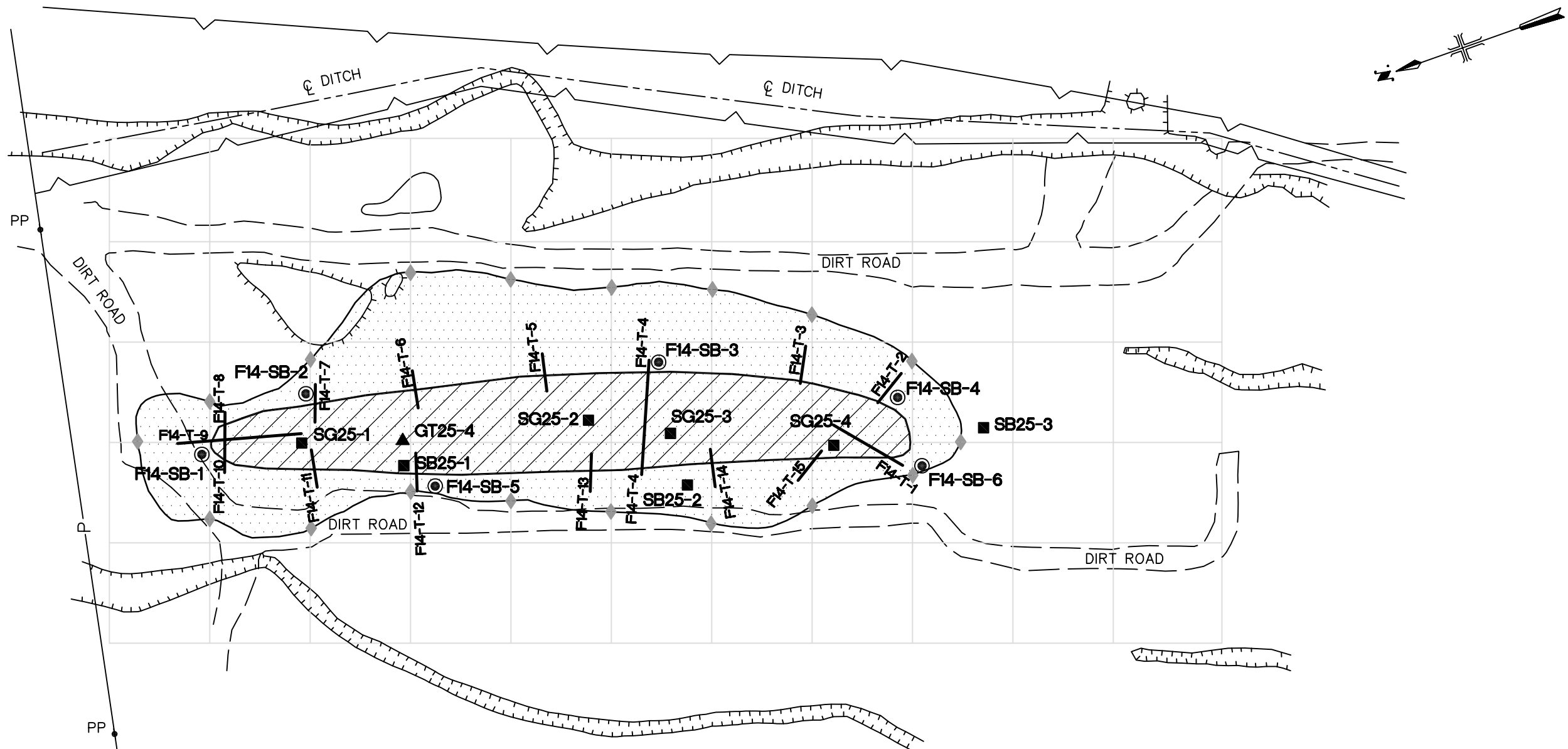


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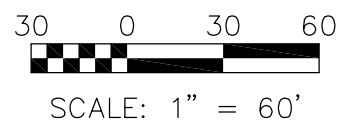
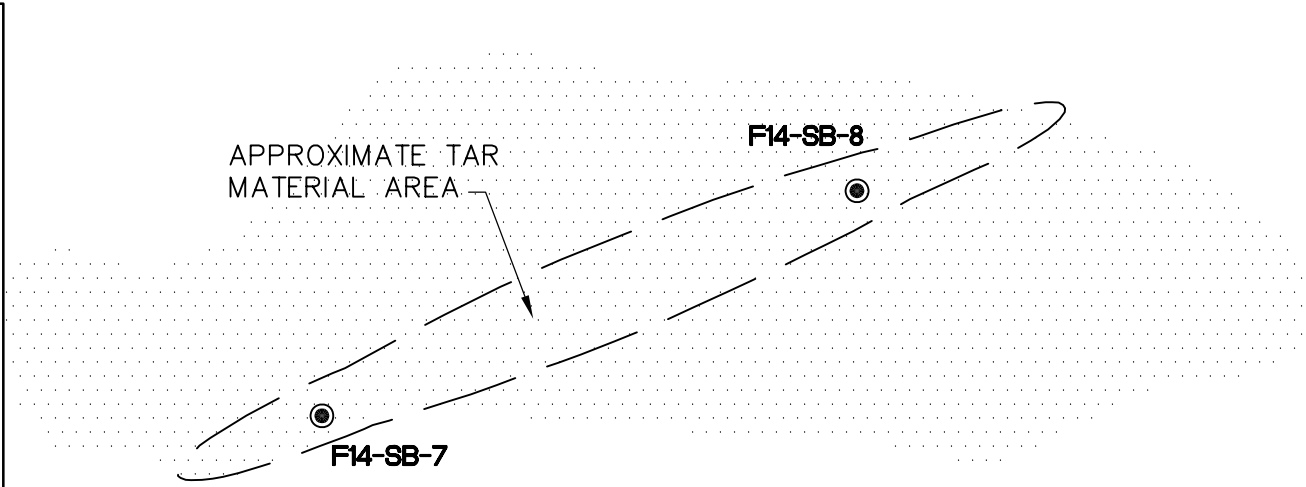
XREFS: I:\IMAGES\I:\ACAD\PROJ\5285027\site.jpg  
User: Gutierrez Spec: PIRNIE STANDARD File: I:\ACAD\PROJ\5285027\5285027-SITE GRID.DWG Scale: 1:1 Date: 05/08/2008 Time: 13:00 Layout: Layout1



**LEGEND**

	ESTIMATED EXTENT OF WASTE BASED ON 2008 INVESTIGATION		POWERLINE
	ROAD		POWER POLE
	RFI SOIL BORINGS		EXTENT OF HIGH TERRAIN CONDUCTIVITY VALUES. BASED ON 1997 TPG GEOPHYSICAL SURVEY
	DEPRESSION		HIGH BANK (DITCH)
	MOUND		RFI TRENCH LOCATION
	SURVEYED FLAGS		TPG SOIL BORING (1997)
			TPG GEOTECHNICAL SAMPLE (1997)

BASE MAP SOURCE: RCRA FACILITY INVESTIGATION THOMPSON PROFESSIONAL GROUP, INC. (JULY,1997)





The area of the high terrain conductivity was interpreted to be disturbed area that may or may not contain buried wastes. TPG (1997) identified a smaller area within the high terrain area as the “interpreted debris trench” where active burial of wastes was conducted.

The locations, dimensions, and materials encountered within each trench were noted in the field logbook. The thickness and nature of the cover material, the types and location of waste encountered, and the nature of the underlying soil are also described. Trench logs are presented in Appendix B.

Malcolm Pirnie marked the actual extent of waste at each trench using a surveying lath and flagging. The trenches were backfilled with the excavated material after the investigation activity was completed.

### **2.2.3. Soil Investigation**

#### ***Soil Borings***

Enviro-Drill, Inc., a New Mexico licensed driller, under the observation of a Malcolm Pirnie geologist, installed eight soil borings utilizing hollow-stem auger techniques. Soil boring activities took place following the initial survey activities (Section 2.2.1) and trenching activities to identify the extent of buried waste.

The borings were located within 5 feet of the verified maximum extent of waste at the locations indicated on Figure 2-1. These borings included:

- One deep soil boring (F14-SB-6) was completed on the south side of the landfill to assess the subsurface geology and the potential for percolation to the regional groundwater aquifer. In accordance with the NMED-approved work plan, the deep boring was completed at 115 feet bgs. A geotechnical sample from this deep boring was collected in the interval 115 to 116.5 feet bgs.
- One soil boring (F14-SB-1) was installed to a depth of 30 feet bgs on the north side of the landfill and one soil boring (F14-SB-4) was installed to a depth of 30 feet bgs on the southeast side of the landfill. The location of soil boring F14-SB-4 was adjusted to within 5 feet of the maximum extent of the wastes based on field trenching activities.
- Three soil borings (F14-SB-2, F14-SB-3, and F14-SB-5) were each installed at a 30-degree angle at locations 7.5 feet outside the extent of waste as defined by the exploratory trenching. A boulder was encountered at approximately 15 feet bgs while drilling boring F14-SB-5. The boulder prevented drilling past 15 feet; therefore, the boring was relocated approximately 5 feet laterally to the south of the first attempt.
- Two soil borings (F14-SB-7 and F14-SB-8) were installed to a depth of 10 feet bgs in the northern and southern portions of the former tar material area. Soil samples were

collected in the 0 to 1 ft interval to determine if COCs in the surface soils exceeded SSLs-Residential. Small fragments of tar ranging from gravel to cobble size were observed scattered across the surface of the former tar material area (Photograph 8). Tar fragments were not observed in the soil borings advanced in this area.

During hollow-stem auger drilling, soil coring was conducted continuously from ground surface to total depth using a 5-foot barrel split spoon sampler. Soil cores were inspected in the field by Malcolm Pirnie's representative for soil classification, color, texture, moisture content, and any other pertinent observations (e.g., evidence of staining). Each five-foot soil core was screened with a photoionization detector (PID). A composite sample of each five-foot soil core was placed in separate plastic sealable bags and any volatile organic compounds (VOCs) were allowed to equilibrate for headspace screening. A headspace reading was collected by placing the PID probe tip into the bag. Boring logs were prepared that describe the soils encountered, the drilling method employed, and the instrumentation readings collected from the sample headspace. The boring logs are presented in Appendix B.

At the completion of the drilling activities, the soil borings were plugged and abandoned with bentonite grout from total depth to ground surface.

### ***Sampling***

Soil samples were collected from each of the borings F14-SB-1 through F14-SB-5 at each of the following intervals: 0-2 feet, 13-15 feet, and 28-30 feet. A fourth subsurface soil sample was collected from boring F14-SB-6 at 113-116 feet bgs. The soil samples that were collected and the performed analyses are indicated in Table 2-1. The shallowest sample interval was used to assess the COCs in the surface soil. The second sample interval was used to assess COCs below the extent of waste. The third sample interval was used to assess the potential vertical migration of the COCs.

Soil samples at the former tar material area were collected at the depth intervals of 0-1 feet bgs from borings F14-SB-7 and F14-SB-8. The 0-1 foot sample interval was used to determine if the tar material has released constituents at the surface. The former tar material area borings were continued to a depth of 10 feet bgs. The soil samples from 1 to 10 feet bgs were screened in the field with the PID.

Twenty-one soil samples were collected at the Oro Grande Landfill during the sampling event. Additionally, three quality control (QC) field duplicate soil samples, two rinsate samples, two samples of investigation derived waste (IDW), and eight trip blanks were collected during the sampling event. The primary samples, QC samples, rinsate samples, IDW samples, and trip blanks were delivered to ALS e-Lab Analytical, in Houston, Texas, and the quality assurance (QA) samples were delivered to GEL Laboratories, LLC, in Charleston, South Carolina. ALS e-Lab and GEL are New Mexico certified laboratories.



**Table 2-1.**  
**Analytical Summary - February 2008**

Sample ID	Sample Interval (feet)	Analyses						
		VOCs	TPH-DROs	PCBs	Inorganics	Pesticides	Herbicides	SVOCs
F14-SB-1(0-2)	0-2	x	x	x	x			
F14-SB-1(13-15)	13-15	x	x	x	x	x	x	
F14-SB-1(28-30)	28-30	x		x	x			x
F14-SB-2(0-2)	0-2	x	x	x	x			
F14-SB-2(13-15)	13-15	x	x	x	x	x	x	
F14-SB-2(28-30)	28-30	x		x	x			x
F14-SB-3(0-2)	0-2	x	x	x	x			
F14-SB-3(13-15)	13-15	x	x	x	x	x	x	
F14-SB-3(28-30)	28-30	x		x	x			x
F14-SB-4(0-2)	0-2	x	x	x	x			
F14-SB-4(13-15)	13-15	x	x	x	x	x	x	
F14-SB-4(28-30)	28-30	x		x	x			x
F14-SB-5(0-2)	0-2	x	x	x	x			
F14-SB-5(13-15)	13-15	x	x	x	x	x	x	
F14-SB-5(28-30)	28-30	x		x	x			x
F14-SB-6(0-2)	0-2	x	x	x	x			
F14-SB-6(13-15)	13-15	x	x	x	x	x	x	
F14-SB-6(28-30)	28-30	x		x	x			x
F14-SB-6(113-115)	113-115	x			x			x
F14-SB-7(0-1)	0-1	x	x	x	x	x	x	x
F14-SB-8(0-1)	0-1	x	x	x	x	x	x	x

*Notes:*

ID = identification number

Inorganics were analyzed by SW-846 Method 6010B (31 chemicals) and cyanide. Analysis by Method 6020 and various other methods. Metals including: arsenic, barium, cadmium, chromium, lead, mercury, selenium, and silver were analyzed by EPA Methods 6020/7471.

TPH-DROs (total petroleum hydrocarbons Diesel Range Organics) analyzed by EPA Method 8015 Modified.

VOCs (volatile organic compounds) analyzed by USEPA Method 8260.

PCBs (polychlorinated biphenyls) analyzed by USEPA Method 8082.

SVOCs (semivolatile organic compounds) analyzed by USEPA Method 8270C.

Herbicides analyzed by USEPA Method 8151.

Pesticides analyzed by USEPA Method 8081.



Samples collected during the RFI were placed in laboratory supplied containers and properly labeled. The sample jars were wrapped in plastic bubble wrap to prevent accidental breakage and then placed within sealable plastic bags. The plastic sample bags were placed, with additional bubble wrap, into plastic garbage bags. The bags were sealed with packing tape and placed within high-strength, ice filled, coolers. The proper chain of custody documents were placed into sealable plastic storage bags and taped to the bottom of the corresponding cooler lid. The coolers were sealed with packing tape to prevent accidental leakage from ice melt. The sample coolers were delivered to the laboratory identified on the chain-of-custody control documents, via an express overnight courier. Copies of the courier's airbill are provided in Appendix B.

### ***Investigation-Derived Waste Management***

IDW generated during the RFI (soil cuttings and wash water) was placed within steel Department of Transportation-approved 55-gallon drums. The IDW drums used during the investigation were staged near the boring locations. The drums were labeled and composite samples of the soil cuttings and decontamination water were collected and submitted to ALS e-Lab for laboratory analysis. The soil cuttings composite sample included material from each drum that contained soil cuttings. The decontamination water was stored in only one drum.

### ***Geotechnical Soil Sampling and Analysis***

#### *Potential Cover Material Geotechnical Sampling*

Six surficial geotechnical samples were collected at soil boring locations F14-SB-1 through F14-SB-5, and F14-SB-7 (see Figure 2-1) to assess the potential use of on-site soil as cover material. The geotechnical samples were collected at a depth interval of 1 to 3 feet bgs. D&H Pump Service, under the observation of Malcolm Pirnie, operated a backhoe to collect the geotechnical samples.

The surface was cleared of vegetation and the first foot of soil was removed and placed to the side of the sampling location. The geotechnical soil samples of the potential cover material were collected in two 5-gallon buckets. The buckets were marked with sampling identification, date, time, and analysis. The filled and labeled buckets were delivered to the geotechnical laboratory for the analyses indicated in Table 2-2. The Falling Head Permeability sample was remolded to 95% of the Modified Proctor density.

#### *Subsurface Geotechnical Sampling and Analysis*

One subsurface geotechnical sample was collected from F14-SB-6 to assess the potential for percolation to the regional groundwater aquifer. Since a clay layer with a minimum five-foot thickness was not encountered, soil boring F14-SB-6 was completed at the 115 to 116.5 foot interval. The subsurface geotechnical sample was collected in-situ using a brass sleeve to preserve sample characteristics.



The geotechnical samples were delivered under chain-of-custody control to AMEC Earth Environmental, Inc., in El Paso, Texas for the analysis indicated in Table 2-2. A copy of the chain-of-custody documentation is provided in Appendix B.

**Table 2-2.  
Geotechnical Analysis - February 2008**

Sample ID	Modified Proctor (ASTM D1557)	Particle Size (ASTM D422)	Plasticity Index (ASTM D4318)	Falling Head Permeability (ASTM D5084)	Constant Head Permeability (ASTM D2434)	Moisture Content (ASTM D2216)
F14-SB-1(1-3)	x	x	x			x
F14-SB-2(1-3)	x	x	x	x		x
F14-SB-3(1-3)	x	x	x			x
F14-SB-4(1-3)	x	x	x			x
F14-SB-5(1-3)	x	x	x	x		x
F14-SB-7(1-3)	x	x	x			x
F14-SB-6(115-116.5)		x	x		x	x

Note: ASTM = American Society for Testing and Materials

#### 2.2.4. Final Site Survey

Under the direction of Malcolm Pirnie, Cutt's Surveying surveyed the marked waste limits from the trenching activities and final boring locations. Vertical and horizontal coordinates and elevations were also recorded with the soil sample depths to determine the elevations of the samples relative to mean sea level. A copy of the surveyor's report is presented in Appendix B.

#### 2.2.5. Screening Level Ecological Risk Assessment Phase I Scoping Assessment

Malcolm Pirnie conducted a Screening Level Ecological Risk Assessment (SLERA) Phase I Scoping Assessment for the Oro Grande Landfill. This Phase I Scoping Assessment was conducted in accordance with *Guidance for Assessing Ecological Risks Posed by Chemicals: Screening-Level Ecological Risk Assessment* published by the NMED Hazardous and Radioactive Material Bureau (2000). In accordance with NMED guidance, the SLERA is divided into two phases: Phase I: Scoping Assessment and Phase II: Screening Assessment. The Phase I Scoping Assessment is a conservative, qualitative assessment of whether ecological receptors or complete exposure pathways to potential contamination exist at the site. The Phase II Screening Assessment is used to

conservatively estimate chemical intake and potential risk to ecological receptors. If the findings of the Phase I Scoping Assessment indicate that there are no receptors and/or complete exposure pathways, then no further assessment of ecological risk is required by NMED guidance.

Malcolm Pirnie coordinated with the Fort Bliss ED to obtain the following information:

- Late spring / early summer biological survey to identify flora and fauna present at the site.
- Flora surveys to describe and document the vegetation communities present on site.
- Threatened and endangered species survey.
- Probable ecological receptors and potential pathways for contaminants of potential ecological concern.

Compilation of basic biological site information consisted of consultations with agencies, acquisition of basic maps, and acquisition of regional natural resource data as outlined in Section 1.1 of the NMED guidance (2000). The Fort Bliss ED was contacted to provide information and actual data from the existing Fort Bliss biological and flora surveys including a water resources inventory and mammal, amphibian, reptile, and bird surveys as deemed practical given the current ecological make-up of the site. Consultation was also conducted with the U.S. Fish and Wildlife Service and New Mexico Game and Fish Department.

The site visit was conducted at the Oro Grande Landfill to directly observe the ecological features and conditions, verify that the expected ecological features exist at the site, and verify current land use. The site visit was conducted in accordance with Section 1.2 of the NMED guidance (2000). The information obtained was used to identify chemicals of potential ecological concern and to develop a preliminary conceptual site exposure model in compliance with requirements of Sections 1.3 and 1.4 of the NMED guidance (2000).

## 3. Results and Data Evaluation

### 3.1. Exploratory Trenching

Various types of waste were encountered within the exploratory trenches including wood, plastics, building materials, and glass. A summary of the materials observed is provided in Table 3-1.

**Table 3-1.**  
**Wastes Observed in Exploratory Trenches**

Trench ID	Cover Thickness (feet)	Thickness of Waste (feet)	Observed Waste Materials
F14-T-1	4	2*	Concrete, glass, wiring, roofing materials.
F14-T-2	4	1	Plastics.
F14-T-3	3	1.5*	Sandbags, paper, plastics, caulking tubes.
F14-T-4	1 - 7	1 - 6	Trash bags, plastics, strapping material, glass bottles.
F14-T-5	10	2	Wiring, a tire, household trash.
F14-T-6	4	5	Glass bottles, plastic strapping material.
F14-T-7	6	3	Spray can, oil absorbent rags, truck axle, trash bags, plastic.
F14-T-8	2	1	Paper and wiring.
F14-T-9	1 - 6	1 - 5	Metal, sheetrock, duct tape, plastic, trash bags, sand bags.
F14-T-10	2	4	Plastic, trash bags, metal.
F14-T-11	2.5	3	Plastic, Styrofoam, plastic netting, trash bags, metal strapping.
F14-T-12	3	2	Copper wiring.
F14-T-13	1	3	Concrete and asphalt debris.
F14-T-14	2	3	Concrete rubble, razor wire, plastics.
F14-T-15	2	3	Plastics and wood.

\* Approximate thickness

The locations of the exploratory trenches are shown on Figure 2-1. Trench F14-T-4 was excavated laterally across the landfill to gauge the extent of width of the waste layer. The other trenches were completed on the estimated extent of the waste, and were not extended into the waste trench once the extent of waste was verified. The following observations are based on the exploratory trenching activities:



U.S. Army Corps of Engineers  
RCRA Facility Investigation Report  
Oro Grande Landfill (SWMU-25/FTBL-14)



3-1

- The landfill cover material consisted of poorly graded sand with clay in the vicinity of soil boring F14-SB-1, silty sand in the vicinity of borings F14-SB-2 and F14-SB-5, and clayey sand in the vicinity of borings F14-SB-3 and F14-SB-4.
- The extent of buried waste was estimated to measure approximately 345 feet in length with an average width of 37 feet, and has an estimated surface area of 0.29 acres.
- The observed thickness of the cover material ranged between 1 and 10 feet with an average thickness of approximately 4.6 feet.
- The average observed thickness of the buried waste layer in the exploration trenches is approximately 2.8 feet. Waste thicknesses up to 10 feet were observed. The estimated volume of the buried waste is approximately 2,300 cubic yards based on the observed average thickness of 2.8 feet.

## 3.2. Soil Investigation

### 3.2.1. Cross Section

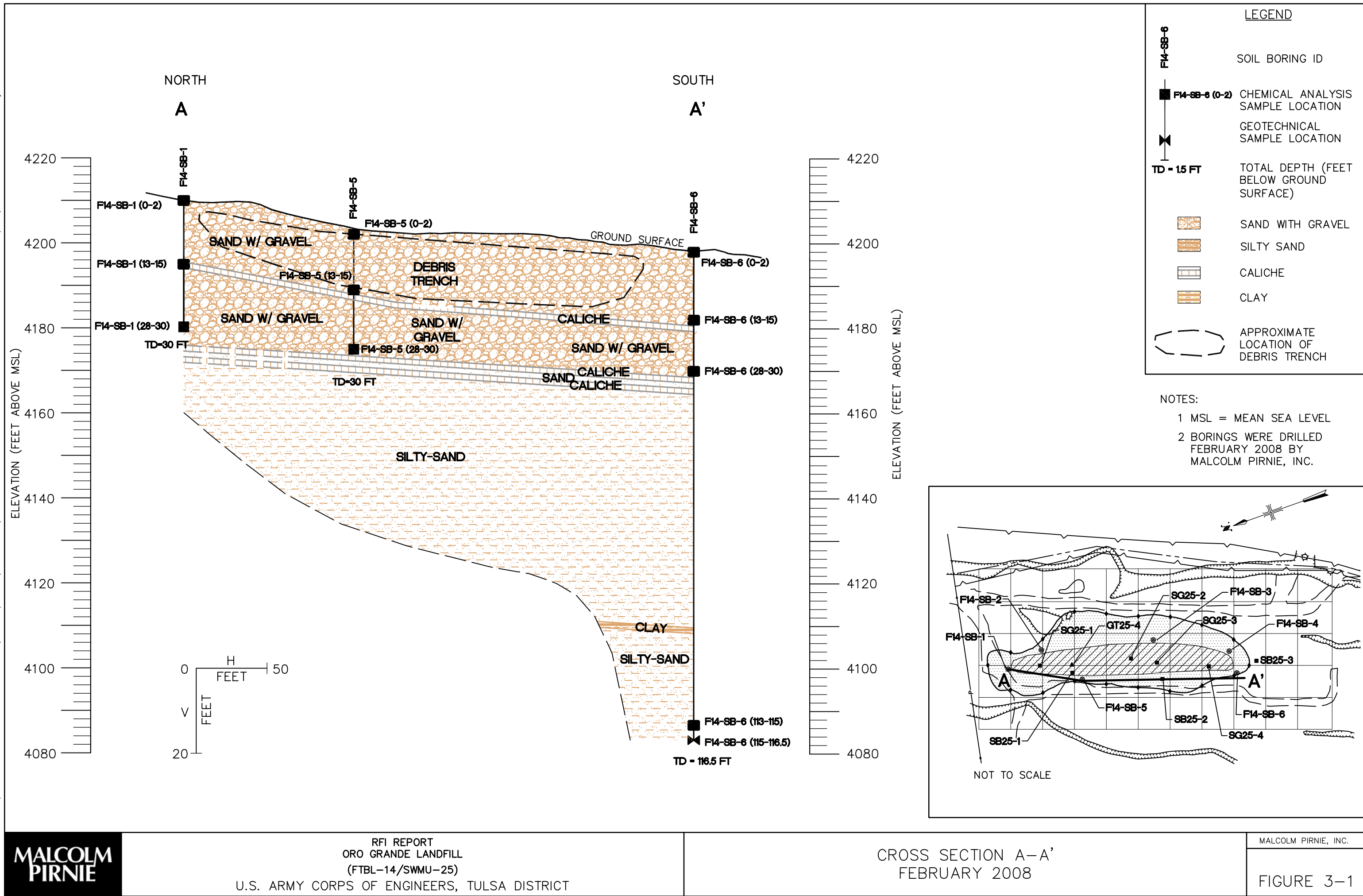
Stratigraphic observations from the six soil borings drilled in the vicinity of the landfill were used to prepare geologic cross sections. Figure 3-1 is a cross section through soil borings F14-SB-1, F15-SB-5, and F14-SB-6 and represents the area outside the western estimated extent of waste. Sand with gravel and interbedded layers of caliche was encountered in borings F14-SB-1, F14-SB-5, and F14-SB-6 to a depth of approximately 30 feet bgs. Beneath this unit was a layer of silty sand which extended to a depth of 85 feet bgs where a six-inch thick layer of clay was observed in boring F14-SB-6. The silty sand extended beneath the clay layer to a depth of 116.5 feet in boring F14-SB-6.

Figure 3-2 is a geologic cross section of borings F14-SB-3 and F14-SB-5. The borings were each drilled at 30° angles on either side of the landfill to a depth of approximately 30 feet bgs to obtain samples from beneath the landfill. Copies of the soil boring logs are presented in Appendix B.

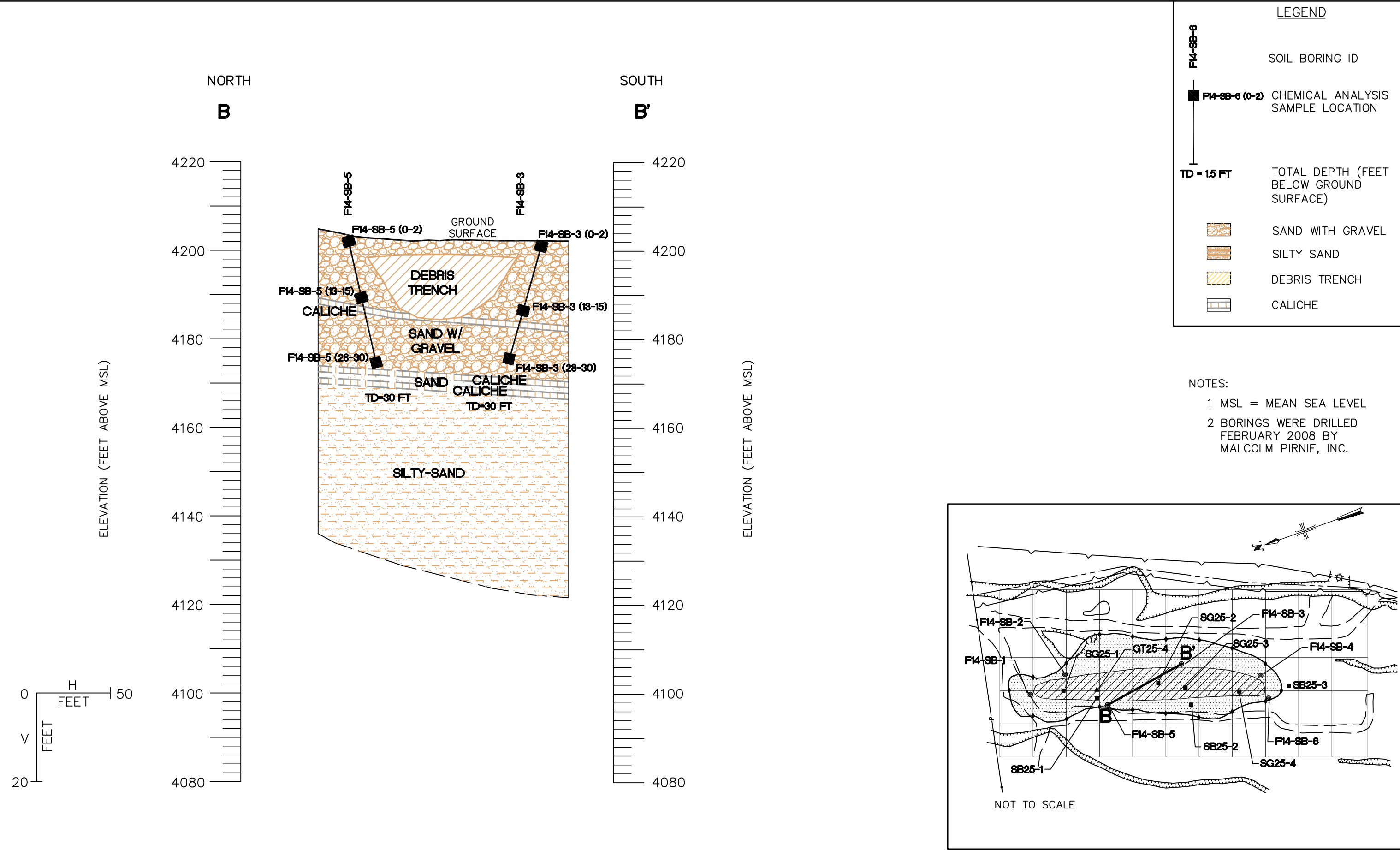
### 3.2.2. Soil Sample Analytical Results

Twenty-one subsurface and three QA/QC duplicate samples were collected during the field activities. Certain VOCs, SVOCs, PCBs, TPH, organochlorine pesticides, and chlorinated herbicides were detected but at concentrations below their respective NMED SSL-Residential. The detected concentrations of inorganic chemicals were below the NMED SSLs-Residential and the USEPA Region 6 Residential Screening Levels (SLs), except for arsenic which was detected at a concentration of 4.01 mg/kg in the soil sample collected from boring F14-SB-5 at the 28-30 foot depth interval.





User: Gutierrez Spec: PIRNIE STANDARD File: I:\ACAD\PROJ\5285027\5285027--CROSS SECTION A-2.DWG Scale: 1:1 Date: 05/08/2008 Time: 12:55 Layout: FIG 1



The single arsenic concentration above the NMED SSL-Residential and the USEPA Region 6 Residential SL was below the USEPA Region 6 published range of arsenic soil background concentrations. A summary of organic compounds detected in the soils is presented in Table 3-2. The summary of inorganic compounds analytical results for the soils is presented in Table 3-3.

### **VOCS**

Dichloromethane (methylene chloride) was detected at concentrations below the NMED SSL-Residential of 182 mg/kg in soil samples at twelve locations. Dichloromethane concentrations ranged from 0.0038 mg/kg in F14-SB-7(0-1) to 0.0062 mg/kg in F14-SB-4(28-30). No other VOCs were detected.

### **SVOCs**

Benzo(k)fluoranthene was detected at a concentration below the NMED SSL-Residential sites of 62.1 mg/kg in the soil sample collected from F14-SB-5(28-30) (0.0066 mg/kg).

The SVOC bis (2-ethylhexyl) phthalate was detected at concentrations below the NMED SSL-Residential sites of 347 mg/kg in 10 soil samples. Detections ranged from 0.0015 mg/kg in F14-SB-8(0-1) to 0.019 mg/kg in F14-SB-5(28-30).

The SVOC caprolactum was detected in three of the soil samples ranging from 0.015 mg/kg in F14-SB-6(13-15) to 0.12 mg/kg in F14-SB-4(28-30). A NMED SSL-Residential has not been established for caprolactum.

The SVOC chrysene was detected in the soil sample collected from F14-SB-5(28-30) at a concentration of 0.0067 mg/kg. The detection was below the NMED SSL-Residential of 615 mg/kg.

The SVOC di-butyl phthalate was detected below the NMED SSL-Residential of 6110 mg/kg at 10 soil samples. Detections ranged from 0.0012 in F14-SB-5(28-30) to 0.015 mg/kg in samples F14-SB-3(28-30) and F14-SB6 (13-15).

### **ORGANOCHLORINE PESTICIDES**

Organochlorine pesticides were not detected in soil samples collected from the site.

### **CHLORINATED HERBICIDES**

Chlorinated herbicides were not detected in soil samples collected from the site.

Table 3 - 2  
Summary of Detections - Organic Compounds - Soil Samples - February 2008  
Oro Grande Landfill - FTBL-14  
Fort Bliss, New Mexico

	F14-SB-1			F14-SB-2			F14-SB-3			F14-SB-4			F14-SB-5			F14-SB-6				F14-SB-7	F14-SB-8	NMED SSLs
Parameters	0-2 ft	13-15 ft	28-30 ft	0-2 ft	13-15 ft	28-30 ft	0-2 ft	13-15 ft	28-30 ft	0-2 ft	13-15 ft	28-30 ft	0-2 ft	13-15 ft	28-30 ft	0-2 ft	13-15 ft	28-30 ft	113-115 ft	0-1 ft	0-1 ft	Residential
Volatile Organic Compounds (mg/kg)																						
Dichloromethane	0.0051 J	0.0054 J	0.0052 J	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	0.0057 J	0.0048 J	0.0062 J	< 0.01	< 0.01	< 0.01	0.0059 J	0.0049 J	0.0054 J	0.0053 J	0.0038 J	0.0039 J	ne
All Other Analytes	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	various
Semivolatile Organic Compounds (mg/kg)																						
Benxo(k)fluoranthene	na	na	< 0.0066	na	na	< 0.0066	na	na	< 0.0066	na	na	< 0.0066	na	na	0.0066 J	na	< 0.0066	< 0.0066	< 0.0066	< 0.0066	< 0.0066	62.1
Bis (2-ethylhexyl)phthalate	na	na	0.014	na	na	0.0091	na	na	0.017	na	na	0.015	na	na	0.019	na	0.015	0.01	0.015	0.0079	0.015	347
Caprolactum	na	na	0.025	na	na	< 0.0066	na	na	< 0.0066	na	na	0.12	na	na	< 0.0066	na	0.015	< 0.0066	< 0.0066	< 0.0066	< 0.0066	ne
Chrysene	na	na	< 0.0066	na	na	< 0.0066	na	na	< 0.0066	na	na	< 0.0066	na	na	0.0067	na	< 0.0066	< 0.0066	< 0.0066	< 0.0066	< 0.0066	615
Di-butyl phthalate	na	na	0.011	na	na	0.0069	na	na	0.015	na	na	0.013	na	na	0.012	na	0.015	0.0078	0.0082	0.0083	0.011	6110
All Other Analytes	na	na	ND	na	na	ND	na	na	ND	na	na	ND	na	na	ND	na	ND	ND	ND	ND	ND	various
Organochlorine Pesticides (mg/kg)																						
All Analytes	na	ND	na	na	ND	na	na	ND	na	na	ND	na	na	ND	na	na	ND	na	na	ND	ND	various
Chlorinated Herbicides (mg/kg)																						
All Analytes	na	ND	na	na	ND	na	na	ND	na	na	ND	na	na	ND	na	na	ND	na	na	ND	ND	various
Polychlorinated Biphenyls (mg/kg)																						
All Analytes	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	na	ND	ND	various
Total Petroleum Hydrocarbons (mg/kg)																						
Diesel Range Organics	< 1.7	< 1.7	na	1.6 J	< 1.7	na	0.51 J	< 1.7	na	< 1.7	< 1.7	na	< 1.7	< 1.7	na	< 1.7	< 1.7	na	na	< 1.7	0.51 J	200 **

**Notes :**  
ND - No detection of chemicals.  
na - Not analyzed  
< - Not detected at listed concentration.  
J - Estimated concentration below reporting limit.  
SSL - Soil Screening Levels from Table A-1, NMED Hazardous Waste Bureau, Technical Background Document for the Development of Soil Screening Levels, Version 4.0, June 2006.  
\*\* - Screening value for soil affected with unknown oil (Table 2a), NMED Total Petroluem Hydrocarbon Screening Guidelines (October 2006).

mg/kg - milligrams per kilogram  
ne - Not Established. No SSL for listed chemical.  
Samples were collected on February 13 to 16, 2008.



Table 3-3  
Summary of Analytical Results for Inorganic Compounds - Soil Samples - February 2008  
Oro Grande Landfill - FTBL-14  
Fort Bliss, Oro Grande, New Mexico

	F14-SB-1			F14-SB-2 (angled boring)			F14-SB-3 (angled boring)			F14-SB-4			F14-SB-5 (angled boring)			F14-SB-6				F14-SB-7	F14-SB-9	NMED SSLs	USEPA Region 6	
Parameters	0-2 ft	13-15 ft	28-30 ft	0-2 ft	13-15 ft	28-30 ft	0-2 ft	13-15 ft	28-30 ft	0-2 ft	13-15 ft	28-30 ft	0-2 ft	13-15 ft	28-30 ft	0-2 ft	13-15 ft	28-30 ft	113-115 ft	0-1 ft	0-1 ft	Residential	Residential SL	Soil Background
Inorganic Chemicals (mg/kg)																								
Aluminum	4280	2980	6000	3960	2340	4260	4340	2960	3020	5430	2740	4360	3770	2370	6420	4230	2320	5370	5470	2700	2970	77800	77000	45000
Antimony	< 0.485	< 0.467	< 0.472	0.199 J	< 0.481	0.193 J	< 0.463	< 0.485	< 0.485	< 0.481	< 0.45	< 0.439	< 0.459	< 0.472	< 0.485	< 0.446	0.173 J	< 0.472	< 0.476	< 0.439	< 0.467	31.3	31	ne
Arsenic	1.92	1.77	3.38	2.16	2.71	2.25	2.59	2.18	2.69	2.77	1.92	1.74	2.27	1.57	4.01	2.41	1.74	2.67	2.01	1.25	1.35	3.9	0.39 / 22 **	1.1 - 16.7
Baruim	110	16.9	24.6	60	30	94.4	124	36.1	58.7	119	44.9	27.5	79.3	24.8	28.7	69.8	31.2	46.2	79.8	37.5	35.9	15600	16000	430
Beryllium	0.285 J	0.209 J	0.304 J	0.254 J	0.147 J	0.255 J	0.269 J	0.184 J	0.213 J	0.346 J	0.191 J	0.228 J	0.225 J	0.145 J	0.354 J	0.298 J	0.185 J	0.254 J	0.292 J	0.23 J	0.196 J	156	160	0.5 - 2
Boron	2.88	4.73	7.42	3.36	4.88	5.53	3.01	4.47	5.01	5.12	3.01	3.81	3.08	4.42	6.82	1.98 J	4.48	5.32	6.41	1.95 J	1.45 J	15600	16000	2 - 200
Cadmium	0.101 J	0.0723 J	0.0791 J	0.0519 J	< 0.481	0.0637 J	0.0548 J	< 0.029	0.038 J	0.0939 J	0.0601 J	0.0672 J	0.0415 J	< 0.472	0.0637 J	0.0591 J	0.0391 J	0.0345 J	0.0309 J	0.058 J	< 0.467	39	39	0.01 - 1
Calcium	49400	14800	32700	28500	11200	39400	61600	12900	43400	48400	8730	28300	38800	11900	49300	26100	15800	22200	7430	2810	7060	ne	ne	ne
Chromium	3.1	2.91	4.14	3.74	3.05	5.22	3.59	3.24	3.22	3.54	2.99	3.1	3.44	2.76	5.34	4.37	3.36	4.88	5.28	3.59	3.38	234	210	38
Cobalt	1.7	1.04	1.96	1.8	0.952	1.88	1.89	1.18	1.64	2.05	0.887	1.33	1.64	0.918	2.2	2.29	1.12	1.79	2.06	1.53	1.23	1520	900	8
Copper	1.95	0.961	1.87	2.1	0.911	2	2.15	1.26	1.64	2.37	1.08	1.3	1.8	0.913	2.38	3.52	1.17	2.79	3.65	1.69	1.72	3130	2900	20
Cyanide	< 2	< 2	< 2	< 2	< 2	< 2	< 2	< 2	< 2	< 2	< 2	< 2	< 2	< 2	< 2	< 2	< 2	< 2	< 2	< 2	< 2	1220	1200	ne
Iron	3600	2840	4640	4240	2790	4530	4660	3360	3890	4320	2710	3190	4030	2620	5640	4840	3130	4740	5140	4490	3690	23500	55000	ne
Lead	3.35	2.51	3.22	3.28	2.3	3.81	3.41	2.57	2.98	4.06	2.39	2.56	3.23	2.25	4.12	4.79	2.47	3.31	3.4	2.92	2.87	400	400	10-18
Lithium	< 4.76	5.63	9.3	< 4.76	< 4.67	5.05	< 4.9	< 4.59	< 4.81	4.82	< 4.72	7.69	< 4.76	< 4.81	15.6	< 4.76	< 4.9	20.1	7.86	< 4.39	< 4.46	ne	ne	ne
Magnesium	2030	1820	3720	2040	1770	2940	2530	1790	2260	2320	1300	2350	2320	1460	5260	1610	1590	4920	2510	898	1050	ne	ne	ne
Manganese	69	43.7	72	73.3	32.9	85.8	74.6	52.3	79	90.5	32.1	50.6	75.1	36.2	84.1	100	47.3	88.2	83.1	67.7	59.2	3590	3500	389 - 850
Mercury	0.00945 J	< 0.0133	< 0.0131	0.00356 J	< 0.0131	0.00219 J	0.0078 J	< 0.0133	< 0.132	0.00524 J	< 0.0132	< 0.0128	0.00197 J	< 0.0132	< 0.0132	0.01 J	< 0.0129	< 0.0131	< 0.0132	< 0.0131	< 0.0128	6.11 *	23	0.1
Molybdenum	0.2 J	0.173 J	0.256 J	0.246 J	0.119 J	0.358 J	0.216 J	0.157 J	0.225 J	0.208 J	0.186 J	0.177 J	0.212 J	0.168 J	0.124 J	0.133 J	0.248 J	0.309 J	0.172 J	0.197 J	0.1 J	391	390	ne
Nickel	3.06	2.07	3.78	2.92	1.88	3.07	3.37	2.29	2.5	4.14	1.8	2.6	2.7	1.79	4.68	3.82	2.08	3.53	3.87	2.5	2.49	1560	1600	16
Phosphorus	88.8	17.2	50	71.2	13.8	117	140	19.8	28.2	128	19.4	41.2	61.2	17.6	123	96.8	14.2	37.5	17.1	62	19.4	ne	ne	ne
Potassium	928	744	1700	1060	809	1220	1160	914	1040	1290	713	1190	972	740	2510	1110	744	1600	1640	608	695	ne	ne	ne
Selenium	0.445 J	0.247 J	0.407 J	0.407 J	0.352 J	0.525	0.709	0.359 J	0.538	0.6	0.221 J	0.286 J	0.576	0.357 J	0.583	0.493	0.425 J	0.403 J	0.452 J	0.34 J	0.324 J	391	390	0.2
Silica	16.3	8.65	14	29.6	8.71	16.9	9.37	9.21	13.4	18.5	12.3	28.5	17.8	13	30.8	33.2	20.3	94.2	196	76	18.3	ne	ne	ne
Silver	0.0285 J	0.0281 J	0.0204 J	0.116 J	0.1 J	0.116 J	0.103 J	0.102 J	0.101 J	0.027 J	0.0189 J	0.0201 J	0.105 J	0.0999 J	0.103 J	0.107 J	0.11 J	0.101 J	0.101 J	0.12 J	0.105 J	391	390	0.01 - 5
Sodium	83.8	403	433	< 47.2	454	367	74.7	452	273	266	290	79.3	42.6 J	202	417	< 44.6	370	463	372	19.3 J	< 46.7	ne	ne	ne
Strontium	90.1	56.9	80.4	68.8	43.7	91.8	130	59.1	107	101	24.7	96.4	91.1	26.6	110	49.7	47	103	43.4	11	20.8	4690	4700	ne
Thallium	0.0813 J	0.0591 J	0.0836 J	0.0651 J	< 0.481	0.0921 J	< 0.463	< 0.049	< 0.0485	0.0798 J	0.053 J	0.0522 J	0.0529 J	< 0.472	0.0667 J	0.0537 J	0.0746 J	0.0517 J	0.0554 J	0.149 J	0.576J	5.16	5.5	ne
Tin	1.03 J	1.07 J	1.13 J	1.04 J	1.09 J	1.08 J	0.945 J	1.1 J	1.03 J	0.972 J	1.05 J	1.07 J	1.00 J	1.06 J	1.07 J	0.955 J	1.12 J	1.18 J	1.05 J	1.07 J	1.05 J	ne	47000	122
Titanium	94	66.5	102	104	65.6	113	91.8	75	104	105	58.6	69.8	97.9	67.8	100	104	69.1	93.3	92.9	80.9	81.1	ne	ne	ne
Vanadium	10.1	10.9	17.8	12	12.3	12.3	11.9	13.8	13.7	12.1	13	9.53	12.1	7.98	18	10.3	10	14.5	15.2	9.97	7.26	78.2	390	66
Zinc	9.47	5.96	10.5	10	5.85	11.5	10.3	7.1	8.96	10.5	5.61	7.45	10.7	5.84	14	12.8	6.58	12.1	13.7	9.42	8.33	23500	23000	22 - 50

**Notes :**  
< - Not detected at listed concentration. mg/kg - milligrams per kilogram Boldface indicates that the detected concentration exceeded NMED SSL-Residential value.  
J - Estimated concentration below reporting limit. Samples were collected on February 13 to 16, 2008.  
ne - not established Analysis conducted by e-Lab, Inc., Houston, TX  
SSL - Soil Screening Levels from Table A-1, NMED Hazardous Waste Bureau, Technical Background Document for the Development of Soil Screening Levels, Version 4.0, June 2006.  
USEPA Region 6 Screening Levels (SLs) and background concentrations from Region 6 Human Health Medium- SCREENING LEVELS Specific Screening Levels 2008  
\* - Mercury (methyl)

### **PCBS**

PCBs were not detected in soil samples collected from the site.

### **TPH**

Diesel range TPH was detected at concentrations below the NMED SSL-Residential of 200 mg/kg in 3 of the 14 samples. Detections ranged from 0.51 mg/kg in F14-SB-3(0-2) and F14-SB-8(0-1) to 1.6 mg/kg in F14-SB-2(0-2).

### **INORGANIC CHEMICALS**

Arsenic was detected in the soil sample F14-SB-5(28-30) (see Table 3-3) at 4.01 mg/kg, which is above the NMED SSL-Residential of 3.9 mg/kg and above the USEPA Region 6 Residential SL of 0.39 mg/kg. The arsenic detection was below the USEPA Region 6 background range for arsenic of 1.1 to 16.7 mg/kg and is considered to be the result of naturally occurring conditions and not due to a release from the landfill. Arsenic was detected in all other samples collected from the site but at concentrations below the NMED SSL-Residential, the USEPA Region 6 Residential SL, and background concentrations.

Antimony, iron, molybdenum, strontium, thallium, and tin were detected below the NMED SSLs-Residential and the USEPA Region 6 Residential SLs.

Calcium, lithium, magnesium, phosphorus, potassium, silica, sodium, and titanium were detected; however, NMED SSLs-Residential, USEPA Region 6 Residential SLs, and USEPA Region 6 background concentrations have not been established for these chemicals.

### **3.2.3. Geotechnical Results**

The results of the geotechnical testing conducted during the RFI are presented on Table 3-4. Sample F14-SB-2 had a hydraulic conductivity of  $1.69 \times 10^{-4}$  centimeters per second (cm/s). Sample F14-SB-5 had a hydraulic conductivity to  $1.6 \times 10^{-4}$  cm/s. Thus, the samples from these two surface soils immediately adjacent to the landfill have a higher hydraulic conductivity than is specified for cover material in NMED *Closure and Post-Closure Care Plan* as follows:

**Table 3-4**  
**Summary of Geotechnical Results**  
**Oro Grande Landfill - FTBL-14**  
**Fort Bliss, Oro Grande, New Mexico**

		D 2487-00		Modified Proctor D 1557			Atterberg Limits D 4318-00			D 422-02	D 2216	Permeability D 5084		Permeability D 2434	
Sample Name	Sample Location	Soil Classification	USCS Classification	Maximum Density (lbs/ft <sup>3</sup> )	Optimum Moisture %	Coarse Specific Gravity	Liquid Limit %	Plastic Limit %	Plasticity Index %	Finer than #200 Sieve %	Moisture Content %	Average K <sub>sat</sub> (cm/s)	Average K <sub>sat</sub> (ft/day)	Average K <sub>sat</sub> (cm/s)	Average K <sub>sat</sub> (ft/day)
F14-SB-1 (1-3)	SB-1	Poorly Graded Sand with Clay	SP-SC	142.5	6	2.647	23	18	5	12	6.5	na	na	na	na
F14-SB-2 (1-3)	SB-2	Silty Sand	SM	128	8.5	na	nv	nv	np	18	11.9	1.69E-04	4.80E-01	na	na
F14-SB-3 (1-3)	SB-3	Clayey Sand	SC	146	5	2.65	30	14	16	16	6.8	na	na	na	na
F14-SB-4 (1-3)	SB-4	Clayey Sand	SC	131	8.5	na	22	13	9	20	10.4	na	na	na	na
F14-SB-5 (1-3)	SB-5	Silty Sand	SM	132	7.5	na	nv	nv	np	17	10.5	1.60E-04	4.54E-01	na	na
F14-SB-7 (1-3)	SB-7	Poorly Graded Sand with Silt	SP-SM	115.5	9.5	na	nv	nv	np	9.6	13	na	na	na	na
F14-SB-6 (115-116.5)	SB-6	Lean Silty Clay	CL	na	na	na	24	16	8	66	9.7	na	na	1.05E-04	2.98E-01

**Notes:**

na - not analyzed

cm/s - centimeters per second

ft/day - feet per day

Section 502.A.1.a and b. under the 1994 Solid Waste Management Regulations, an infiltration layer of a minimum of 18 inches of earthen material having a saturated hydraulic conductivity less than or equal to the saturated hydraulic conductivity of any bottom liner system or natural subsoils present, or a saturated hydraulic conductivity no greater than  $1 \times 10^{-5}$  cm/sec whichever is less. An erosion layer consisting of at least 6 inches of earthen material that is capable of sustaining native plant growth. Alternative covers may be submitted but they must meet the criteria in the Regulations and receive approval from the Department.

The subsurface soil sample collected from boring F14-SB-6 at a depth of 115-116.5 feet had a hydraulic conductivity of  $1.05 \times 10^{-4}$  cm/s.

### 3.3. Data Quality Assessment

The data quality review indicated that QC protocols were met. Some data quality issues were observed related to method blank interference, rinsewater interference, field duplicate and laboratory duplicate relative percent difference outliers, and low matrix spike/matrix spike duplicate percent recoveries. Overall, the data set was considered usable and meets the project data quality objectives.

### 3.4. Final Site Survey

Under the direction of Malcolm Pirnie, Cutts Land Surveying returned to the site to survey the marked waste limits from the trenching activities and the final boring locations. Vertical and horizontal coordinates and elevations were incorporated with the soil sample depths to determine the elevations of the samples relative to mean sea level. Ground surface elevations were measured to the nearest 0.01-foot (Table 3-5).

**Table 3-5.  
Final Survey of Soil Borings**

Boring ID	Northing	Easting	Elevation (ft)
F14-SB-1	11,760,150.24	1,286,296.30	4208.68
F14-SB-2	11,760,107.11	1,286,330.11	4207.95
F14-SB-3	11,759,920.75	1,286,342.10	4202.62
F14-SB-4	11,759,799.12	1,286,327.45	4198.67
F14-SB-5	11,760,030.67	1,286,283.06	4203.50
F14-SB-6	11,759,794.50	1,286,284.56	4198.57
F14-SB-7	11,760,011.69	1,286,031.53	4201.78
F14-SB-8	11,759,838.51	1,286,092.46	4196.88



The surveyed coordinates of the extent of waste limits and the starting and ending points of each exploratory trench, as well as the ground surface elevation of each point is shown in Table 3-6.

**Table 3-6.  
Final Survey of Exploratory Trenches**

Trench ID	Location of Measurement	Northing	Easting	Elevation (ft)
F14-T-1	Starting Point	11,759,842.59	1,286,313.80	4199.66
F14-T-1	Waste	11,759,804.03	1,286,294.58	4199.02
F14-T-1	End Point	11,759,799.55	1,286,293.00	4198.96
F14-T-2	Starting Point	11,759,800.64	1,286,351.35	4199.41
F14-T-2	Waste	11,759,810.46	1,286,322.58	4198.99
F14-T-2	End Point	11,759,812.80	1,286,316.30	4198.83
F14-T-3	Starting Point	11,759,864.87	1,286,346.89	4200.87
F14-T-3	Waste	11,759,866.94	1,286,332.03	4200.43
F14-T-3	End Point	11,759,866.85	1,286,330.72	4200.56
F14-T-4	Starting Point	11,759,931.86	1,286,284.84	4201.53
F14-T-4	Waste-1	11,759,931.84	1,286,287.66	4201.09
F14-T-4	Waste-2	11,759,927.67	1,286,337.02	4202.47
F14-T-4	End Point	11,759,927.68	1,286,341.30	4202.75
F14-T-5	Starting Point	11,759,864.87	1,286,346.89	4200.87
F14-T-5	Waste	11,759,866.94	1,286,332.03	4200.43
F14-T-5	End Point	11,759,866.85	1,286,330.72	4200.56
F14-T-6	Starting Point	11,760,043.59	1,286,322.11	4204.82
F14-T-6	Waste	11,760,044.80	1,286,328.23	4205.09
F14-T-6	End Point	11,760,045.05	1,286,337.90	4205.66
F14-T-7	Starting Point	11,760,100.86	1,286,319.05	4207.09
F14-T-7	Waste	11,760,100.73	1,286,322.81	4207.12
F14-T-7	End Point	11,760,100.68	1,286,340.08	4208.86
F14-T-8	Starting Point	11,760,141.61	1,286,306.14	4208.51
F14-T-8	Waste	11,760,143.44	1,286,314.66	4208.65
F14-T-8	End Point	11,760,144.67	1,286,319.58	4208.94

**Table 3-6 (continued)**

Trench ID	Location of Measurement	Northing	Easting	Elevation (ft)
F14-T-9	Starting Point	11,760,103.38	1,286,311.33	4206.65
F14-T-9	Waste	11,760,149.75	1,286,304.07	4208.88
F14-T-9	End Point	11,760,156.15	1,286,302.93	4209.44
F14-T-10	Starting Point	11,760,139.54	1,286,300.41	4207.88
F14-T-10	Waste	11,760,138.36	1,286,293.01	4207.86
F14-T-10	End Point	11,760,137.82	1,286,288.53	4207.75
F14-T-11	Starting Point	11,760,099.53	1,286,306.60	4205.98
F14-T-11	Waste	11,760,096.67	1,286,289.33	4206.63
F14-T-11	End Point	11,760,096.10	1,286,282.53	4206.63
F14-T-12	Starting Point	11,760,038.21	1,286,293.47	4203.39
F14-T-12	Waste	11,760,037.74	1,286,290.04	4203.74
F14-T-12	End Point	11,760,037.19	1,286,277.97	4204.69
F14-T-13	Starting Point	11,759,959.77	1,286,295.73	4201.59
F14-T-13	Waste	11,759,960.80	1,286,286.41	4201.39
F14-T-13	End Point	11,759,960.76	1,286,282.56	4202.08
F14-T-14	Starting Point	11,759,892.80	1,286,294.84	4199.79
F14-T-14	Waste	11,759,891.65	1,286,288.90	4200.75
F14-T-15	Starting Point	11,759,834.88	1,286,301.27	4199.38
F14-T-15	Waste	11,759,839.09	1,286,292.43	4199.76
F14-T-15	End Point	11,759,843.39	1,286,285.14	4200.22

### 3.5. Conceptual Site Model

This conceptual site model (CSM) was developed following the USEPA's 1998 *Guidance for Conducting Remedial Investigations and Feasibility Studies under CERCLA* [Comprehensive Environmental Response, Compensation, and Liability Act] (EPA/540/G-89/004), a guidance document issued by the USEPA for hazardous waste sites. This CSM summarizes the current understanding of the landfill based on field observations and analytical results.

This CSM describes the landfill and its environmental setting based on existing knowledge, as well as sources, receptors, and the interactions that link them. It represents the best professional judgment of the investigator on the potential for COCs to reach

receptors, based on the likely COCs present and the landfill environmental setting, migration pathways, and receptors. The CSM is a living model which is updated as additional information becomes available.

The CSM presents information regarding: 1) current and future reasonably anticipated or proposed uses of the real property and 2) actual, potentially complete, or incomplete exposure pathways that link them. The landfill information profiles for the CSM are provided in Table 3-7.

Table 3-7. Conceptual Site Model Profile		
Profile Type	Information Needs	Assessment Findings
Site Profile	Installation Name	Oro Grande Range Camp
	Installation Location	Oro Grande, Fort Bliss Military Reservation, Otero County, New Mexico
	Site Name	Oro Grande Landfill (SWMU-25/FTBL-14)
	Site Location	The landfill is located approximately 0.75 miles south-southwest of the Oro Grande Range Camp and approximately 0.8 miles southeast of the main camp road and southwest of Elephant Mountain.
	Site History	<p>Operations at the landfill commenced around 1964. The contents of the landfill occasionally were burned. The landfill was closed in 1994 and reportedly contained approximately 600 cubic yards of waste material at the time of closure (Wagner, 2000).</p> <p>Prior to 1995, the Oro Grande Landfill was an unpermitted landfill. The Oro Grande Landfill was included in the original RCRA Permit (NM4213720101-01) issued in 1995. This permit expired in 2005. In June 2005, Fort Bliss submitted an application for a Corrective Actions Only Permit for the SWMUs that were not yet closed, including the Oro Grande Landfill. There are no other permits pertaining to the landfill at FTBL-14.</p>
	Site Area and Layout	<p>The Oro Grande Landfill was a 2-acre trench-style landfill. Based on the February 2008 field investigation activities, the landfill trench was estimated to be approximately 345 feet in length by an average of 37 feet wide. Observations of the wastes in the exploratory trenches indicated the depth of the landfill was between 1 and 12 feet bgs and that the depth of waste may extend beyond 12 feet in areas not assessed by trenching. The cover thickness was observed to range between 1 and 10 feet. The cap on the landfill is composed of native soil.</p> <p>The landfill cover does not appear to meet the requirements of</p>

**Table 3-7. Conceptual Site Model Profile**

Profile Type	Information Needs	Assessment Findings
		the New Mexico Solid Waste Bureau. No evidence of significant erosion was observed.
	Site Structures	No structures exist at the landfill. Oro Grande Range Camp is located north of the landfill.
	Site Boundaries	The current usage of the surrounding properties is as a military range. No unauthorized human use is allowed.
	Site Security	The Oro Grande Landfill is not fenced.
<b>Physical Profile</b>	Climate	The Oro Grande Landfill is described as having characteristics of a high desert climate with average annual rainfall of approximately 11.5 inches and high seasonal temperatures.
	Topography	The approximate elevation across the area ranges from 4,196 to 4,208 feet above mean sea level. The terrain around the landfill generally slopes to the south-southwest.
	Geology	<p>Otero County, New Mexico, is considered the easternmost edge of the Basin and Range province (O'Neill, 1998). Geologically, the Fort Bliss Military Reservation is located within the Tularosa Basin and Hueco Bolson of the New Mexico Highland section of the Basin and Range province.</p> <p>The Oro Grande Landfill is located on the basin flats west of the Hueco Mountains. Subsurface soils in this portion of the basin are comprised of dry unconsolidated basin fill deposits of fine-grained sand, silt, caliches, and clays. The basin fill may range in thickness up to 8,000 feet.</p> <p>The subsurface soils at the landfill consisted of fine-grained sand with chalky caliche gravel and gravel-sized rock fragments mixed throughout. Three caliche layers were interbedded within the gravelly sand at depth intervals of 13–15 feet bgs, 31–34 feet bgs, and 37–39 feet bgs. Densely packed silty sand was encountered at a depth of approximately 40 feet bgs. A 6-inch layer of dense clay was observed at a depth of 85.5–86 feet bgs. Silty sand extended beneath the clay lens and extended beyond the depth of 116.5 feet bgs. Saturated conditions were not observed during the RFI activities.</p>
	Soil	The Pendero fine sand is present at the landfill (USDA, 2007). The soil is characterized as a fine to loamy fine sand having 2% to 5% slopes and extensively drained.
	Hydrogeology	Groundwater in the vicinity is expected to occur between 250 and 500 feet bgs (USGS, 1974). Groundwater in Otero County is used for irrigational purposes; drinking water at the Oro Grande Range Camp is piped in from the White Sands Missile Range Headquarters. No water sources are located at the Oro Grande Landfill site. Saturated conditions were not encountered



**Table 3-7. Conceptual Site Model Profile**

Profile Type	Information Needs	Assessment Findings
		during the RFI activities.
	Hydrology	Natural arroyos are located in the vicinity of the landfill and appear to be naturally formed by surface runoff from infrequent rainfall events. Surface flow follows the general topography to the south-southwest.
	Vegetation	Desert grasses, desert palms, and small brush typically less than 1 meter high are common throughout the Oro Grande Landfill.
<b>Land Use and Exposure Profile</b>	Current Land Use	The land is currently used as a military range.
	Current Human Receptors	Currently, humans do not frequently access the landfill. Potential human receptors are U.S. Army personnel, construction workers/contractors, and trespassers.
	Current Activities (frequency, nature of activity)	The land is currently used as a military range. Humans do not frequently access the landfill; however, Army personnel and contractors may be required to work near or at the landfill (e.g., training or sampling activities).  Trespassers have also been known to frequent the area. Unauthorized hikers explore nearby closed mines in and around Elephant Mountain.
	Potential Future Land Use	The future land use of the property is as a military range.
	Potential Future Human Receptors	Potential future human receptors are U.S. Army personnel, construction workers/contractors, and trespassers.
	Potential Future Land Use-Related Activities:	The future land use of the landfill and surrounding property is not expected to change from the use as a military range.
	Zoning / Land Use Restrictions	The property is a military range. Land is restricted to use by the U.S. military and contractors.
	Demographics/ Zoning	Demographic details are not available for Oro Grande, New Mexico. The estimated population for Otero County, New Mexico, in 2004 was approximately 62,282. The average number of people per square mile is estimated at 9.4.  Oro Grande Range Camp has two dining facilities, a single maintenance facility, and billeting space for 800 personnel.

### 3.5.1. Exposure Pathway Analysis

A key element of the CSM is the exposure pathway analysis. A complete or potentially complete exposure pathway must include the following components: 1) a source; 2) a medium (e.g., surface soil); 3) an exposure route (e.g., dermal contact); and 4) a receptor (e.g., U.S. Army personnel, construction workers/contractors, or trespassers). If the point of exposure is not at the same location as the source, the pathway may also include a release mechanism (e.g., volatilization) and a transport medium (e.g., air).

A release of COCs has not occurred from past usage of the site. Arsenic was detected in sample F14-SB-5(28-30) at a concentration above the NMED Residential SSLs and USEPA Residential SLs, but below the USEPA Region 6 Background concentration. The detected arsenic concentration is considered to be a result of naturally occurring conditions. Selenium was detected above background concentrations in 21 of the 21 samples collected from the site; however, the detections were below the NMED Residential SSLs. No other inorganic COCs were detected at concentrations above background. No release of COCs from the Oro Grande Landfill was detected; therefore, exposure pathways are considered incomplete.

Potential receptors include both human (U.S. Army personnel, contractors/visitors, and trespassers) and ecological receptors (biota) that may come in contact with COCs located within potentially affected media from the landfill. Though the exposure pathways may potentially exist, extensive exposures to COCs are not anticipated as the landfill is capped, this area is not frequently accessed by human receptors, and animals may forage at the landfill only occasionally. While erosion of the surface soil is possible, erosion on the landfill does not appear to be significant based on evidence of erosion in adjacent arroyos. Exposure pathways are discussed below.

#### ***SURFACE WATER AND SEDIMENT***

Ephemeral arroyos are located between the east side of the landfill and the foot of Elephant Mountain and to the west side of the landfill. Surface runoff in the ephemeral arroyos could carry surface soil from the edge of the landfill and redeposit it. However, the cap on the landfill prevents the migration of COCs in surface water and sediment. COC exceedances were not detected in soils. Thus, surface water and sediment exposure pathways are considered potentially complete.

#### ***PLANT/ANIMAL UPTAKE***

COCs were not detected in soils exceeding background concentrations; therefore, the pathway for plant/animal uptake is considered potentially complete.

### ***VOLATILIZATION/AIR***

Volatilization of COCs into the air is considered a potentially complete pathway as inorganic compounds do not volatilize and organic chemicals were either not detected or were detected at concentrations below the NMED Residential SSLs.

### ***SURFACE SOIL***

A potentially complete pathway exists for surface soils since COCs were detected at concentrations below either USEPA background concentrations or NMED Residential SSLs. No evidence of significant erosion of the landfill cap has been observed.

### ***SUBSURFACE SOIL***

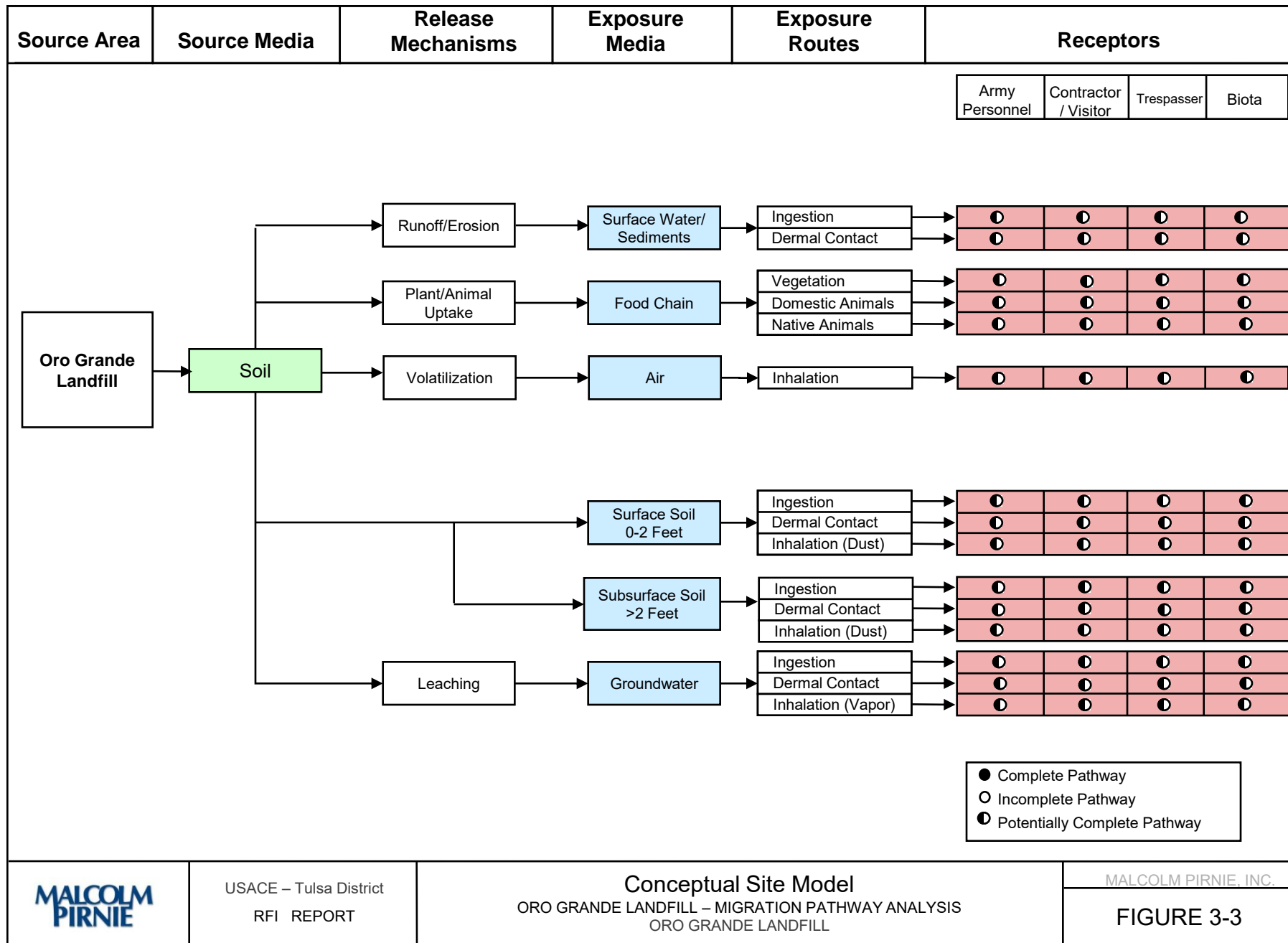
COCs were not detected in subsurface soils at concentrations exceeding background concentrations; therefore, the pathway for subsurface soils is considered potentially complete.

### ***GROUNDWATER***

Groundwater was not observed at the Oro Grande Landfill during the RFI to a depth of 116.5 feet bgs. Subsurface soils are comprised of silty and gravelly sand with interbedded layers of chalky caliche extending to a depth of approximately 34 feet bgs. Beneath this layer is a layer of silty-sand that extended to a depth approximately 85 feet bgs where a six-inch thick layer of dense clay was observed. Silty-sand extended beneath the clay layer to 116.5 feet. The vertical hydraulic conductivity of the subsurface soils is approximately  $1 \times 10^{-4}$  cm/s as measured in a sample collected from 115 to 116.5 feet bgs. The vertical hydraulic conductivity of the soil sample collected at 115 to 116.5 feet bgs from boring SB-6 was  $1.05 \times 10^{-4}$  cm/s. The migration pathway to groundwater is considered potentially complete due to the depth to groundwater and the absence of COC detections above background levels in the subsurface soils,

## **3.5.2. Graphical Representation of Exposure Pathway Analysis**

The CSM identifies the exposure pathways through which receptors could come in contact with or be impacted by COCs. Figure 3-3 provides a graphical representation of the current understanding of the landfill environmental setting based on the discussion in Section 3.5.



## 4. Screening Level Ecological Risk Assessment Phase I Scoping Assessment Results

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Malcolm Pirnie conducted an ecological assessment of the Oro Grande Landfill and the adjacent areas on February 11 and 12, 2008. The landfill and surrounding areas were identified as Chihuahuan desert scrub dominated by creosote bush and low shrub snakeweed. Based on the ecological assessment and consultation with the United States Fish and Wildlife Service and the New Mexico Department of Game and Fish, it was determined that no sensitive environments or rare, threatened, endangered, candidate and/or proposed species (plants or animals), or any otherwise protected species exist within close proximity to the landfill. In addition, chemicals of concern were not detected in surface soil above NMED Residential SSLs or background concentration; therefore, exposure pathways are considered incomplete. A copy of the SLERA Phase I Scoping Assessment is presented in Appendix E.



U.S. Army Corps of Engineers  
RCRA Facility Investigation Report  
Oro Grande Landfill (SWMU-25/FTBL-14)



4-1



## 5. Summary of Findings and Recommendations

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### 5.1. Summary of Findings

The following summary of conclusions is based on the findings of the investigation activities conducted during the RFI:

- Buried wastes observed at the Oro Grande Landfill consisted of concrete, glass, building materials, plastic, wiring, packaging materials, and demolition debris.
- Cover material observed in the exploratory trenches consists of poorly-graded sand with clay, silty sand, and clayey sand with a thickness ranging from 1 to 10 feet with an average thickness of approximately 4.6 feet.
- The extent of buried waste is approximately 345 feet by 37 feet with an estimated surface area of 0.29 acres.
- The average observed thickness of the buried waste layer in the exploration trenches is approximately 2.8 feet. Waste thicknesses up to 10 feet were observed. The estimated volume of the buried waste is approximately 2,300 cubic yards based on the observed average thickness of 2.8 feet.
- Native materials below the buried wastes consist of sand with gravel and interbedded layers of caliche to a depth of approximately 30 feet bgs, silty sand to 116.5 feet bgs.
- Saturated conditions were not observed at the Oro Grande Landfill between ground surface and 116.5 feet bgs.
- No evidence of a release of COCs from the buried wastes was detected. The single detection of a COC above NMED SSL-Residential values was arsenic in a sample collected from 28-30 feet bgs. This arsenic detection of 4.01 mg/kg is below the published USEPA Region 6 background concentration.
- Surficial soils at the Oro Grande Landfill have a measured hydraulic conductivity of approximately  $1.6 \times 10^{-4}$  cm/s. This indicates that the native surficial material does not meet the NMED *Closure and Post-Closure Care Plan* requirement for landfill cover material with a saturated hydraulic conductivity less than  $1 \times 10^{-5}$  cm/sec.

- No completed exposure pathways to potential human or ecological receptors were identified because no releases of COCs were observed.

## 5.2. Recommendations

Malcolm Pirnie recommends that Fort Bliss prepare and submit a request for a Class 3 permit modification to NMED to remove the Oro Grande Landfill (SWMU-25/FTBL-14) from the requirement to conduct corrective action pursuant to their RCRA permit. The Oro Grande Landfill is listed on Table 2 of the RCRA Permit No.: NM4213720101-01 issued to the United States Army Air Defense Center and Fort Bliss, New Mexico. Table 2 is the List of Solid Waste Management Units and Areas of Concern Requiring Corrective Action. The recommended permit modification will request moving the Oro Grande Landfill from Table 2 to Table 3 in the RCRA permit. Table 3 is the List of Solid Waste Management Units and Areas of Concern Not Currently Requiring Corrective Action.

The basis for the permit modification request is the RFI which demonstrates that no release of COCs has occurred. NMED's determination of No Further Action is based on Fort Bliss' demonstration that no additional corrective action is required to protect human health and the environment. NMED considers five general criteria to determine whether NFA is appropriate. NFA is appropriate for the Oro Grande Landfill because it meets NMED NFA Criteria 3: *"No release to the environment has occurred or is likely to occur in the future from the SWMU/AOC"*

The request for the Class 3 permit medication will also involve public notice and a public comment period.

Should NMED grant the permit modification and No Further Action status for the landfill, Fort Bliss should then seek to close the landfill in accordance with *Solid Waste Facility and Composting Facility Closure and Post Closure Requirements* under the New Mexico Administrative Code (20 NMAC 9.VI).

An evaluation should be conducted of potential closure options under the NMED solid waste regulations for the buried waste observed at the Oro Grande Landfill. These closure options would include closure in-place and removal of the buried waste. Closure in-place would require the design and installation of a cover system meeting the NMED closure requirements for a municipal landfill. Removal of the buried wastes would involve excavation, loading, and off-site transport of the wastes to a permitted landfill facility. The evaluation of potential remedial options should include an engineering evaluation and analysis of potential costs.

While the trenches excavated during the RFI activities delineated the lateral extent of the buried wastes, the trenches did not, in most cases, extend to the center of the landfill. Additional trenching should be conducted to obtain information regarding the thickness of the buried waste and the thickness of the cover material. This information will be needed for the design and costing of potential closure options.

## 6. References

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# Appendix A: Historical Information



U.S. Army Corps of Engineers  
RCRA Facility Investigation Report  
Oro Grande Landfill (SWMU-25/FTBL-14)



**A**

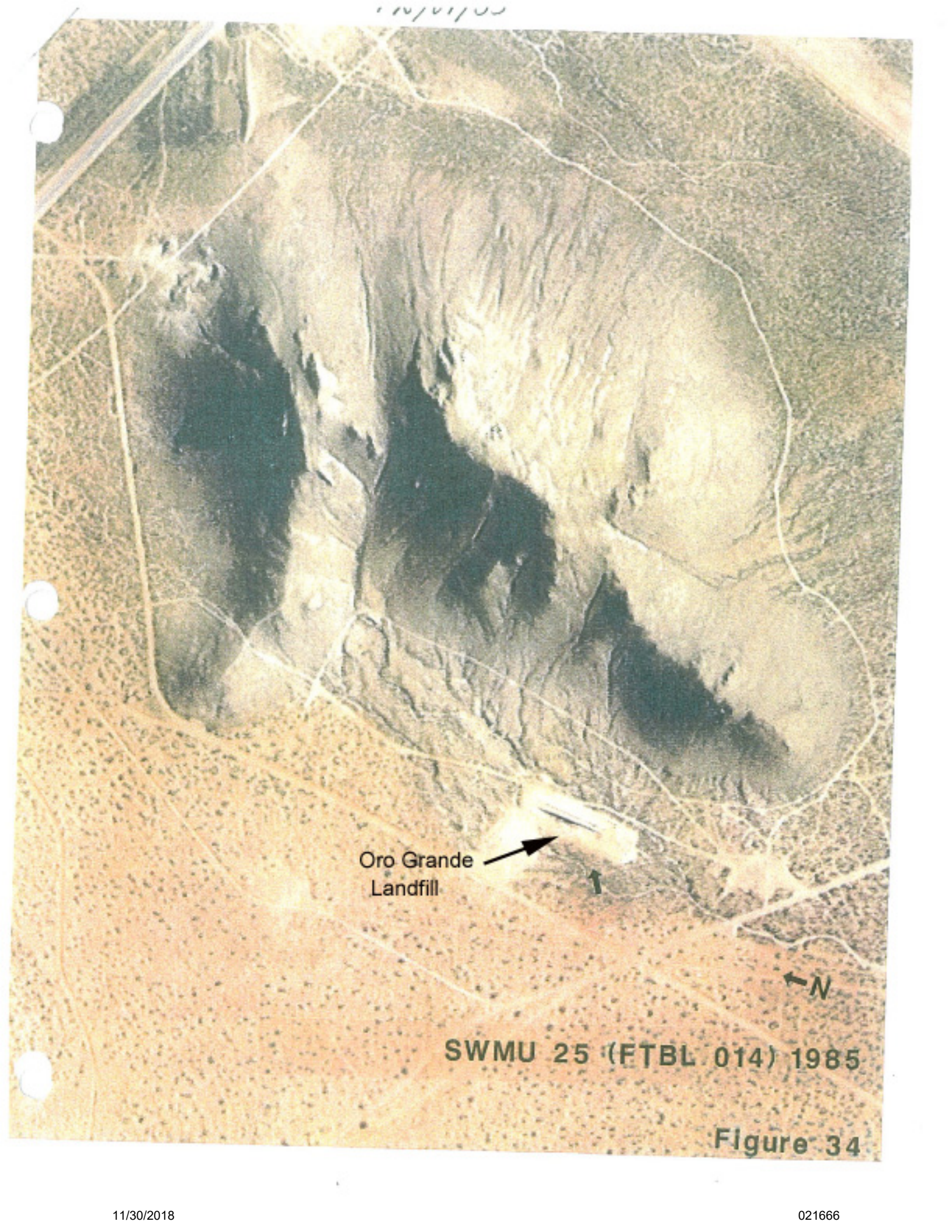




**Figure 33**



11/30/05



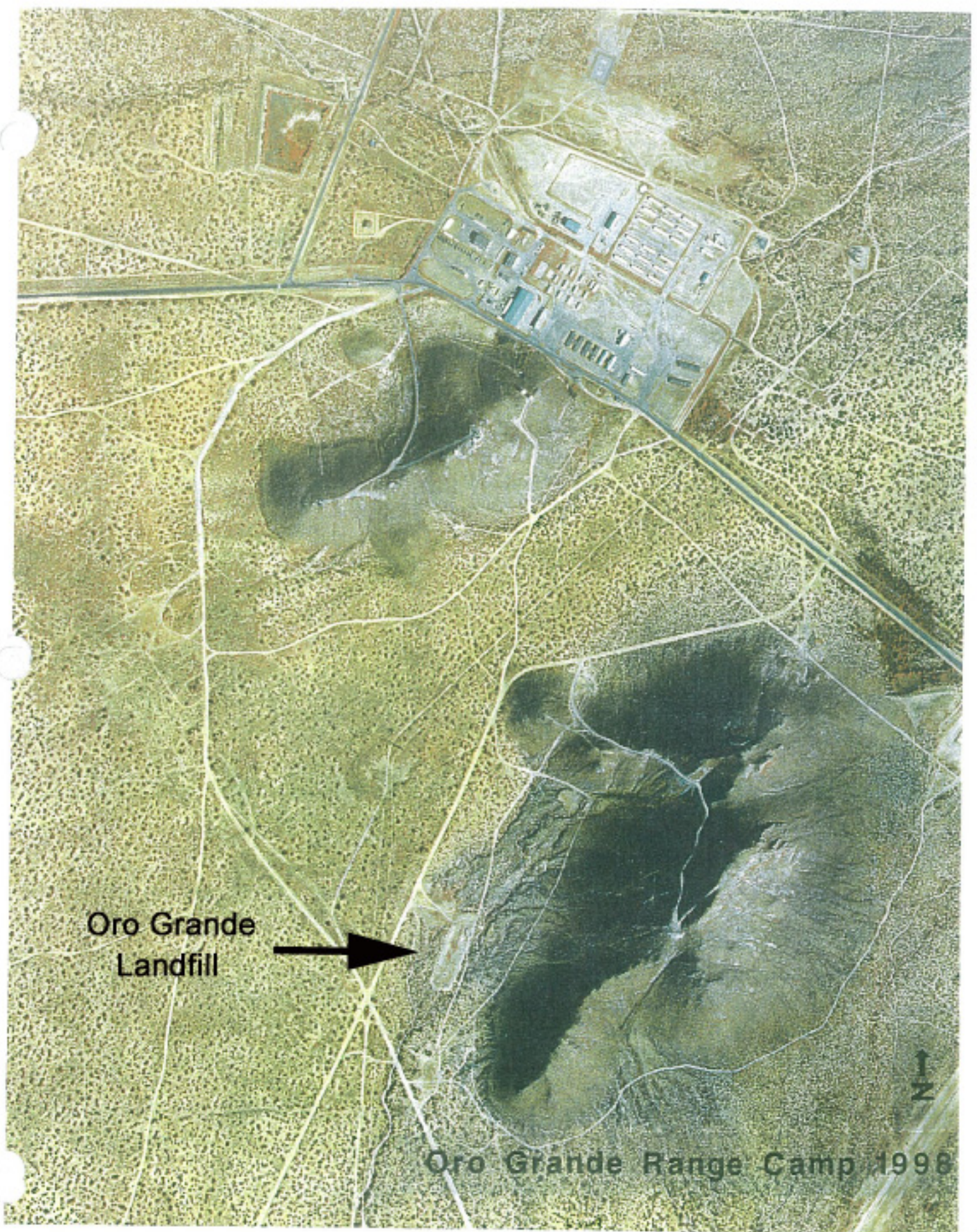
An aerial photograph showing a large, irregularly shaped area of land. The central part of the image is a dark, textured area, likely a landfill, with a lighter, more uniform area to its right. A road or path runs diagonally across the lower part of the image. A north arrow is located in the lower right corner, pointing towards the top right. The text 'Oro Grande Landfill' is written in the lower left, with an arrow pointing to the dark area. The text 'SWMU 25 (FTBL 014) 1985' is written in the lower center. The text 'Figure 34' is written in the lower right.

Oro Grande  
Landfill

SWMU 25 (FTBL 014) 1985

Figure 34





**Figure 31**



## **Appendix B: Field Documentation**

- **Excavation Request**
- **Soil Boring Logs**
- **Exploratory Trench Logs**
- **Photographic Log**
- **Field Notes**
- **Daily Quality Control Reports**
- **Chain of Custody**
- **Surveyors Report**

# **Excavation Request**

## EXCAVATION REQUEST

(IAW AR 415-15)

#393

Print Form

No Ground Disturbance Is Authorized Before Concurring Signatures In ALL SIGNATURE BOXES Have Been Obtained

## Section I: To Be Completed By Requesting Individual

Installation POC/Phone #: Kelly Blough 276-342/568-0794 DPW W/O Number, MCA or other Project Number: W912BV-04-D-2008 TO7, Mod 1

From: (complete office/name of requesting individual and address)

Blough, Kelly  
DPW - Environmental  
Bldg 622  
kelly.blough@US.army.mil

Purpose of request:

Soil borings and trenches around former Orogrande Landfill FTBL-14150MU-25. South of Range Camp west of Elephant Mountain

Location of proposed dig: (attach map/drawing/ detailed plans)

See Figure 2-1 and 2-2 attached

Equipment to be used: (equipment must meet safety standards established by the Dept of Army and OSHA)

Hand Tools:

Shovels, hand augers

Mechanical Equipment:

backhoe, drill Rig.

Excavation will begin:

Date:

11 Feb → 20 Feb 2008

Time:

08:00

Requesting individual: (please print name, grade, title)

Signature:

Date:

Kelly Blough, YDOZ, Compliance Cleanup Mgr.

[Signature]

17 Jan 2008

## Section II: To Be Completed By Directorate of Public Works (DPW) - Bldg 777 (915) 568-2753

☐ Location of the proposed excavation has been checked and the location of existing utilities or interfering facilities is indicated on maps furnished.☒ No mechanical excavation will be accomplished within three feet of utilities and hand tools will be used without exception.☒ Area excavated will be satisfactorily backfilled ☐ Drawings/electronic files furnished (to include irrigation systems)☒ Return to Master Planning after completion with as-builts

Recommend:

Signature:

Date:

☒ Approval☐ Disapproval

[Signature]

17 Jan 08

## Section III: To Be Completed By Directorate of Information Management (DOIM) - Bldg 56 (915) 568-1222

☐ Location of the proposed excavation has been checked and no underground communication cables exist in the vicinity of the excavation.☒ Location of proposed excavation has been checked and underground communication cables exist in the vicinity of the excavation. Call (915) 568-5594 prior to the beginning of any excavation work.

Recommend:

Signature:

Date:

☒ Approval☐ Disapproval

[Signature]

1-23-08

## Section IV: To Be Completed By Directorate of Environment (DOE) - Bldg 624 (915) 568-6999 / 568-6746

Recommend:

Comments:

NO known Arch. Sites. Stop if bones or other cultural materials found. Call Joe -

☒ Approval☐ Disapproval

Signature:

[Signature]

568-6999

Date:

23 Jan 08

## Section V: Obtain Following Approval Signatures:

Please note: A service order is required to mark all utilities.

Rio Grande Electric Service Representative  
3633 Mattox Ave. / (915) 778-0152

Date:

1-23-08

Signature:

[Signature]

Texas Gas Service Representative  
4700 Pollard St. / (915) 680-7329

Date:

1-23-08

Signature:

[Signature]

Ft. Bliss Water Service Representative  
National O & M Representative  
Bldg 1320 / (915) 569-5359

Date:

1/24/08

Signatures:

[Signature] Water/Water

Final Approval from Master Planning Division Chief  
Bldg 777 / (915) 568-5933

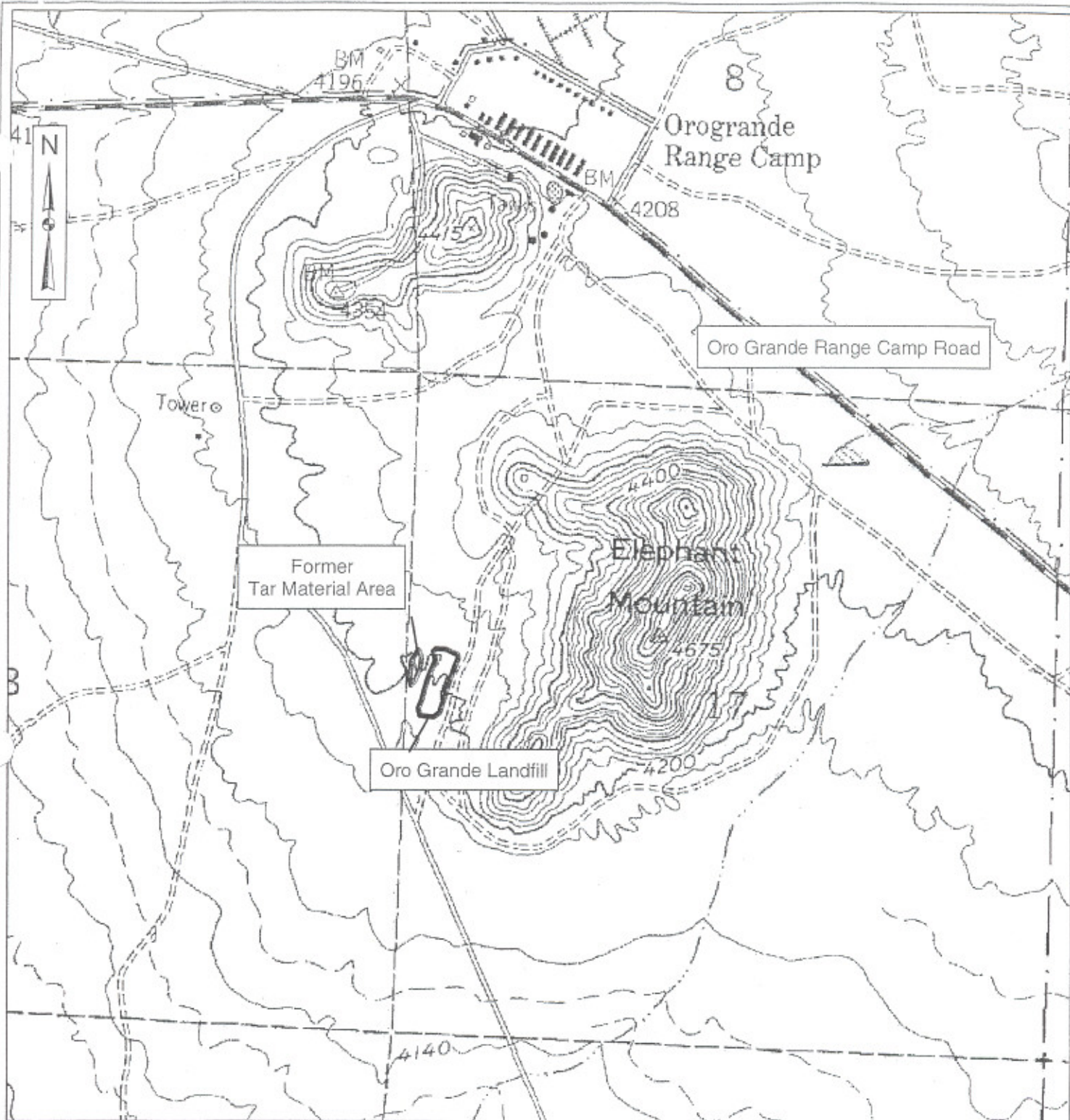
Date:

01/25/08

Signature:

[Signature]





LEGEND

— Estimated Limits of Landfill and Former Tar Material Area

**MALCOLM  
PIRNIE**

RFI WORK PLAN  
ORO GRANDE LANDFILL  
(FTBL-14/SWMU-25)

FORT BLISS MILITARY RESERVATION  
NEW MEXICO

0 500 1,000 2,000 Feet

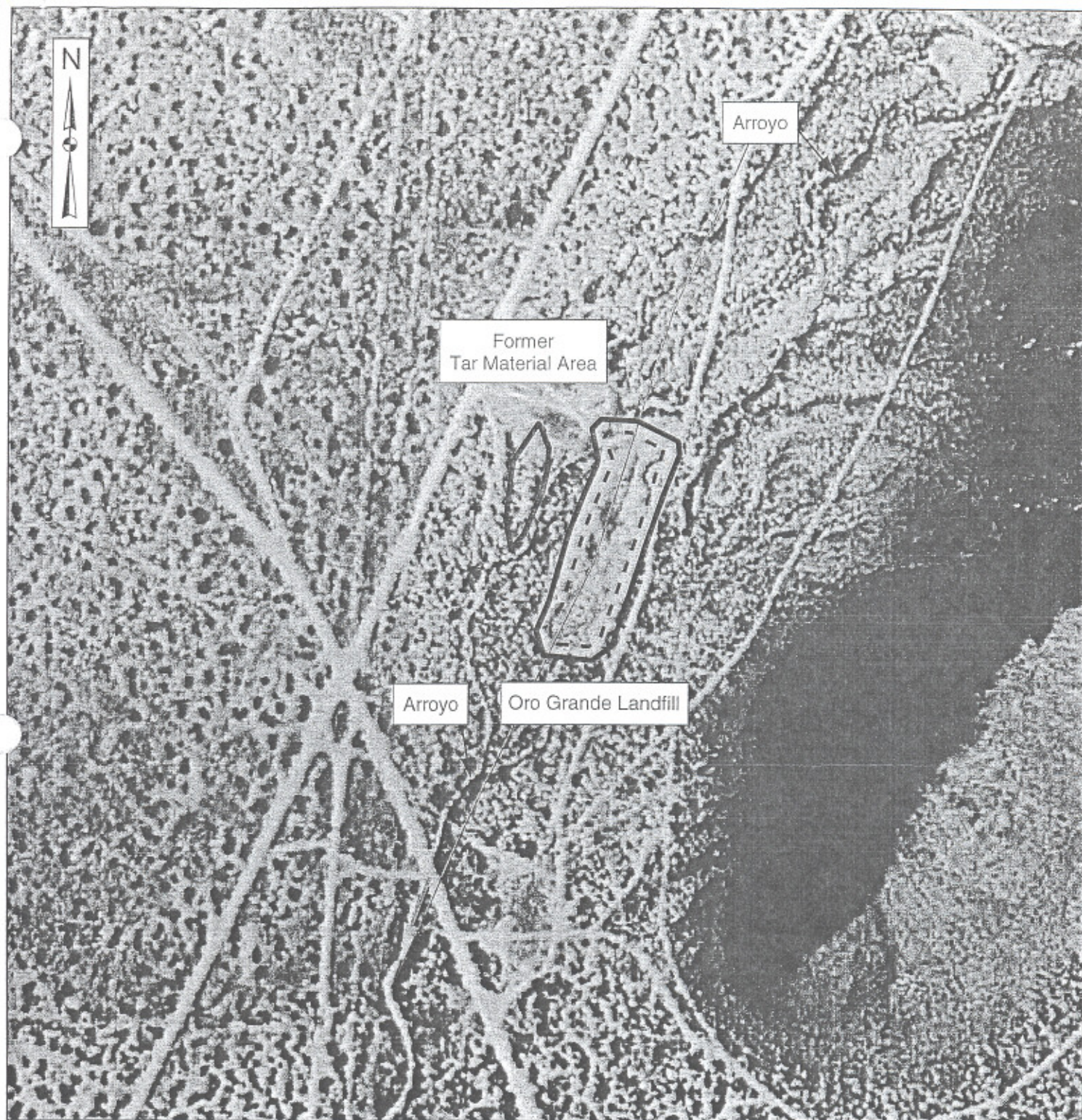
**SITE LOCATION**

Source: USGS (1962) Elephant  
Mountain Quadrangle, 7.5 Minute

MALCOLM PIRNIE, INC.

WORK PLAN  
FIGURE 2 - 1





Source: USGS Digital Orthophoto Quarter-Quadrangle (1998) from New Mexico Resource Geographic Information System, Elephant Mountain, 7.5 min quadrangle, southeast quarter

LEGEND

-  Estimated Limits of Landfill and Former Tar Material Area
-  Surface Drainage Direction
-  Suspected Landfill Boundary (TPG, 1997)

**MALCOLM  
PIRNIE**

**RFI WORK PLAN  
ORO GRANDE LANDFILL  
(FTBL-14/SWMU-25)**

**FORT BLISS MILITARY RESERVATION  
NEW MEXICO**

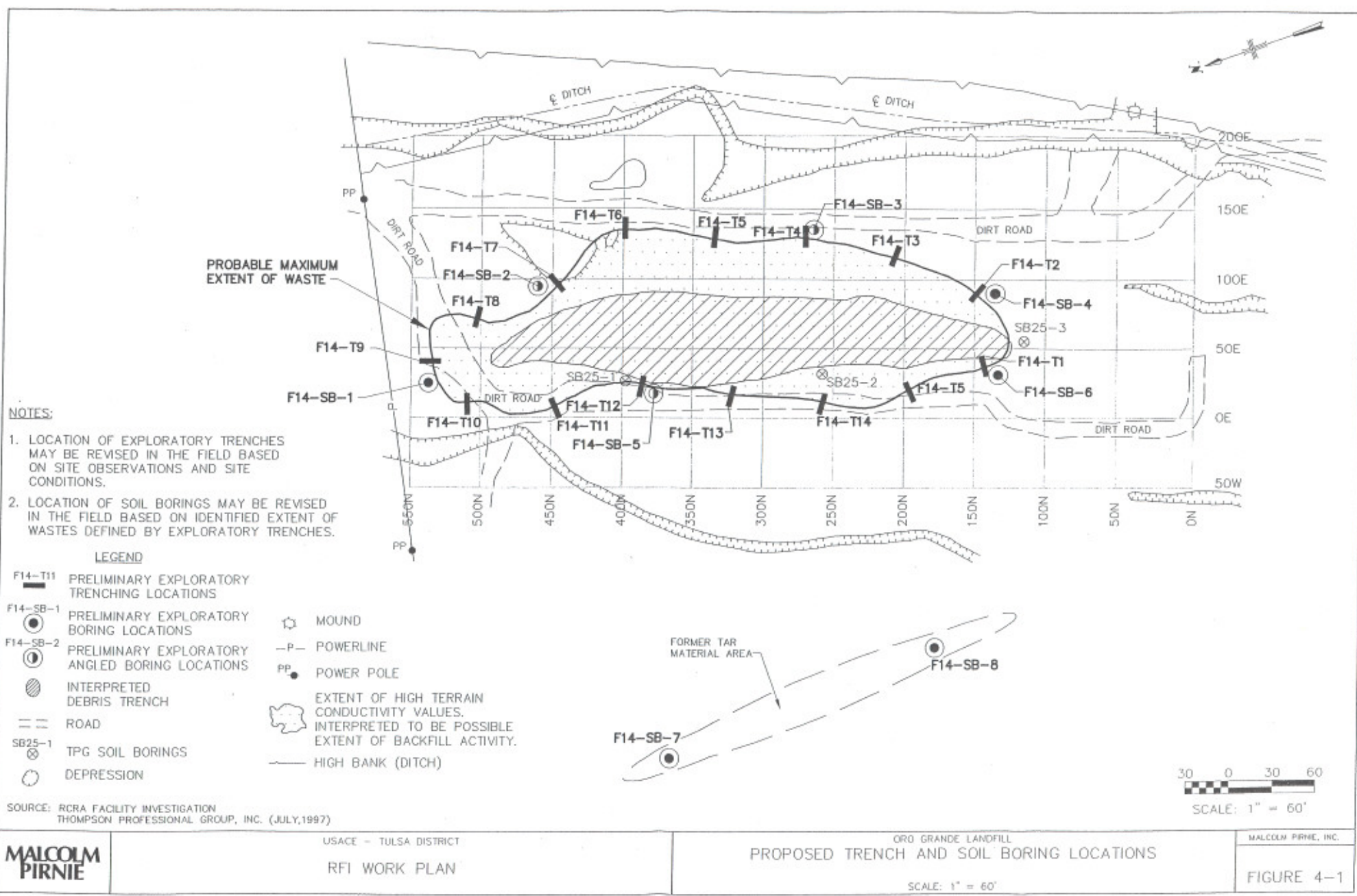
0 175 350 700 Feet

**AERIAL VIEW OF  
SITE LOCATION**

**MALCOLM PIRNIE, INC.**

**WORK PLAN  
FIGURE 2 - 2**





**MALCOLM  
PIRNIE**

USACE - TULSA DISTRICT  
RFI WORK PLAN

ORO GRANDE LANDFILL  
PROPOSED TRENCH AND SOIL BORING LOCATIONS

SCALE: 1" = 60'

MALCOLM PIRNIE, INC.  
FIGURE 4-1

# SERVICE ORDER REQUEST FORM

DATE: 17 Jan 2008

RANK/NAME: Kelly Blough DPW-E

TELEPHONE #: 915 276-3421, 568-0794

ALTERNATE #: \_\_\_\_\_

BLDG #: ~~BLDG~~

UNIT ASSIGNED

CUSTOMER ID #: \_\_\_\_\_

(WE ARE UNABLE TO PROCESS YOUR REQUEST IF THE UNIT ID # IS NOT PROVIDED. THIS IS REQUIRED FOR BLDGS ONLY.)

IF YOU'RE CLEARING QUARTERS, ENTER DATE: \_\_\_\_\_

DESCRIPTION OF REQUEST: \_\_\_\_\_

Gas 14299-8

Electric 14300-8

Water 14301-8

SEW-72 14302-8

# **Soil Boring Logs**

## BORING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	<i>5285-027</i>
<b>PROJECT</b>	<i>FB-14 Oro Grande Landfill</i>	<b>DRILLING CONTRACTOR</b>	<i>Enviro-Drill</i>
<b>LOCATION</b>	<i>Oro Grande, NM</i>	<b>DRILLER</b>	<i>Mike Stone</i>
<b>START DATE</b>	<i>13-Feb-08</i>	<b>DRILLING METHOD</b>	<i>HSA</i>
<b>FINISH DATE</b>	<i>13-Feb-08</i>	<b>HYDROGEOLOGIST</b>	<i>C. Melson</i>

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
0-5'	SAND, fine grained, loosely packed, tan/reddish. Gravel sized chalky caliche and gravel sized rock fragments.	SW	0.0	Sample F14-SB-1(0-2)
5	SAND, fine grained tan/reddish, caliche gravel and rock throughout. Firm, dense, and compact.		0.0	
10			0.0	
15			0.0	Sample F14-SB-1(13-15)
20			0.0	
25			0.6	
30	14'-15' - Dense layer of dry compact caliche.	0.0	Sample F14-SB-1(28-30)	
Total Depth = 30.0 ft bgs				

All depths are in feet below grade.

SHEET **1** OF **1**

## BORING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	<i>5285-027</i>
<b>PROJECT</b>	<i>FB-14 Oro Grande Landfill</i>	<b>DRILLING CONTRACTOR</b>	<i>Enviro-Drill</i>
<b>LOCATION</b>	<i>Oro Grande, NM</i>	<b>DRILLER</b>	<i>Mike Stone</i>
<b>START DATE</b>	<i>15-Feb-08</i>	<b>DRILLING METHOD</b>	<i>HSA 30° angle</i>
<b>FINISH DATE</b>	<i>15-Feb-08</i>	<b>HYDROGEOLOGIST</b>	<i>C. Melson</i>

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
0-5'	SAND, light tan, coarse grained with gravel sized rock fragments.	SW	0.0	Sample F14-SB-2(0-2)
5-10'	SAND, fine grained, loosely packed, light tan. Gravel sized rock and root fragments throughout.		0.0	
10-15'	SAND, light reddish-tan, fine grained and loosely packed.		0.0	Sample F14-SB-2(13-15)
15-30'	SAND, light reddish-tan, fine grained, with gravel sized chalky caliche and gravel to cobble sized quartzite rock fragments. Firm, dense, and compact. Dry.		0.0	
			0.6	
			0.0	Sample F14-SB-2(28-30)
30				
Total Depth = 30.0 ft bgs				
Note: Drilled 35 linear ft at 30° angle to reach a point approximately 17 ft beneath the landfill material and approximately 30 ft bgs.				

All depths are in feet below grade.

SHEET **1** OF **1**



## BORING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	<i>5285-027</i>
<b>PROJECT</b>	<i>FB-14 Oro Grande Landfill</i>	<b>DRILLING CONTRACTOR</b>	<i>Enviro-Drill</i>
<b>LOCATION</b>	<i>Oro Grande, NM</i>	<b>DRILLER</b>	<i>Mike Stone</i>
<b>START DATE</b>	<i>15-Feb-08</i>	<b>DRILLING METHOD</b>	<i>HSA 30° angle</i>
<b>FINISH DATE</b>	<i>15-Feb-08</i>	<b>HYDROGEOLOGIST</b>	<i>C. Melson</i>

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
0-5'	SAND, fine grained, loosely packed, tan/reddish. Gravel sized chalky caliche and gravel sized rock fragments.	SW	0.0	Sample F14-SB-3(0-2)
5			0.0	
5'-25'	SAND, light reddish-tan, gravel sized chalky caliche and rock mixed throughout. Firm, dense, and compact.		0.0	
10			0.0	
15			0.0	Sample F14-SB-3(13-15)
17'-20'	Dense layer of compact caliche.		0.0	
20		0.0		
25		0.0		
25'-30'	SAND, light reddish-tan, fine grained with gravel to cobble sized rock fragments mixed throughout. Dry.		0.0	Sample F14-SB-3(28-30)
30				
Total Depth = 30.0 ft bgs				
Note: Drilled 35 linear ft at 30° angle to reach a point approximately 17 ft beneath the landfill material and approximately 30 ft bgs.				

All depths are in feet below grade.

SHEET **1** OF **1**

## BORING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	<i>5285-027</i>
<b>PROJECT</b>	<i>FB-14 Oro Grande Landfill</i>	<b>DRILLING CONTRACTOR</b>	<i>Enviro-Drill</i>
<b>LOCATION</b>	<i>Oro Grande, NM</i>	<b>DRILLER</b>	<i>Mike Stone</i>
<b>START DATE</b>	<i>13-Feb-08</i>	<b>DRILLING METHOD</b>	<i>HSA</i>
<b>FINISH DATE</b>	<i>13-Feb-08</i>	<b>HYDROGEOLOGIST</b>	<i>C. Melson</i>

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
0-5'	SAND, fine grained, loosely packed, tan/reddish. Chalky caliche and coarse grained gravel.	SW	0.0	Sample F14-SB-4(0-2)
5-10'	SAND, fine grained, loosely packed, tan/reddish. Chalky caliche and coarse grained gravel.		0.5	
10-15'	SAND, fine grained, loosely packed, tan/reddish. Chalky caliche and coarse grained gravel.		0.0	Sample F14-SB-4(13-15)
15-20'	SAND, tan/reddish, loosely packed, with dense white chalky caliche layer at 17'-20'.		0.7	
20-25'	SAND, tan/reddish, loosely packed with gravel sized rock and chalky caliche gravel. Very dense at 28-30 ft.		0.3	
25-30'	SAND, tan/reddish, loosely packed with gravel sized rock and chalky caliche gravel. Dry.		0.0	Sample F14-SB-4(28-30)
Total Depth = 30.0 ft bgs				

All depths are in feet below grade.

SHEET **1** OF **1**

## BORING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	<i>5285-027</i>
<b>PROJECT</b>	<i>FB-14 Oro Grande Landfill</i>	<b>DRILLING CONTRACTOR</b>	<i>Enviro-Drill</i>
<b>LOCATION</b>	<i>Oro Grande, NM</i>	<b>DRILLER</b>	<i>Mike Stone</i>
<b>START DATE</b>	<i>13-Feb-08</i>	<b>DRILLING METHOD</b>	<i>HSA 30° angle</i>
<b>FINISH DATE</b>	<i>13-Feb-08</i>	<b>HYDROGEOLOGIST</b>	<i>C. Melson</i>

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
0-5'	SAND, coarse grained with gravel, loosely packed, tan/reddish.	SW	0.0	Sample F14-SB-5(0-2)
5			1.2	
5'-15'	SAND, reddish-tan, fine grained, with gravel sized rock. Compact and firm.		0.6	Sample F14-SB-5(13-15)
10			1.2	
15			0.0	
15'-20'	SAND, light tan with chalky white caliche and gravel sized rock fragments. Compact and firm.		1.2	
20			0.0	
20'-30'	SAND, light reddish-tan with gravel to cobble sized rock fragments and chalky caliche fragments. Firm and dense. Dry.		1.2	Sample F14-SB-5(28-30)
25				
30				
Total Depth = 30.0 ft bgs				
Note: Drilled 35 linear ft at 30° angle to reach a point approximately 17 ft beneath the landfill material and approximately 30 ft bgs.				

All depths are in feet below grade.

SHEET **1** OF **1**

## BORING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	<i>5285-027</i>
<b>PROJECT</b>	<i>FB-14 Oro Grande Landfill</i>	<b>DRILLING CONTRACTOR</b>	<i>Enviro-Drill</i>
<b>LOCATION</b>	<i>Oro Grande, NM</i>	<b>DRILLER</b>	<i>Mike Stone</i>
<b>START DATE</b>	<i>12-Feb-08</i>	<b>DRILLING METHOD</b>	<i>HSA</i>
<b>FINISH DATE</b>	<i>13-Feb-08</i>	<b>HYDROGEOLOGIST</b>	<i>C. Melson</i>

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
0-5'	SAND, fine grained, loosely packed, tan/light brown with coarse grained gravel and chalky caliche.	SW	0.7	Sample F14-SB-6(0-2)
5				
5'-10'	SAND, fine grained, loosely packed, tan/light brown with coarse grained gravel and chalky caliche. Dense and compact at 9-10 ft.		0.0	
10				
10'-15'	SAND, fine grained, light brown/tan compact and dense with chalky gravel sized caliche at 14-15 ft.		0.6	Sample F14-SB-6(13-15)
15				
15'-20'	SAND, fine grained, light reddish/tan. Compact, dense, chalky caliche abundant throughout.		0.4	
20				
20'-25'	SAND, fine grained light tan. Compact, dense, chalky caliche throughout.		1.3	
25				
25'-30'	SAND, fine grained, light reddish/tan, loosely packed.	1.5	Sample F14-SB-6(28-30)	
30				
30'-35'	SAND, fine grained light reddish/tan with layer of light tan sand and chalky caliche between 31 and 34 ft.	1.6		
35				
35'-40'	SAND, fine grained, light reddish/tan. Dense layer of sand and caliche between 37 and 39 ft. Mixture of silty-sand and gravel sized caliche and quartzite rock fragments at 39-40 ft.	1.7		
40				
	Continued on next page.			

All depths are in feet below grade.

SHEET **1** OF **3**

## BORING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	<i>5285-027</i>
<b>PROJECT</b>	<i>FB-14 Oro Grande Landfill</i>	<b>DRILLING CONTRACTOR</b>	<i>Enviro-Drill</i>
<b>LOCATION</b>	<i>Oro Grande, NM</i>	<b>DRILLER</b>	<i>Mike Stone</i>
<b>START DATE</b>	<i>12-Feb-08</i>	<b>DRILLING METHOD</b>	<i>HSA</i>
<b>FINISH DATE</b>	<i>13-Feb-08</i>	<b>HYDROGEOLOGIST</b>	<i>C. Melson</i>

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
<b>40'-50'</b>	Mixture of silty-sand, chalky caliche, and gravel to cobble sized quartzite rock fragments. Firm and densely packed.		0.0	
45			0.3	
50	<b>50'-57'</b> SILTY-SAND, fine grained, light tan to brown. Compact and dense with quartzite gravel mixed throughout.		2.8	
55			2.5	
<b>57'-80'</b>	SILTY-SAND, fine grained, loosely packed,		2.3	
60			1.9	
65			n/a	
70	Quartzite rock fragments encountered after 72 ft.		n/a	
75				
80				
	Continued on next page.			

All depths are in feet below grade.

SHEET **2** OF **3**



## BORING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	<i>5285-027</i>
<b>PROJECT</b>	<i>FB-14 Oro Grande Landfill</i>	<b>DRILLING CONTRACTOR</b>	<i>Enviro-Drill</i>
<b>LOCATION</b>	<i>Oro Grande, NM</i>	<b>DRILLER</b>	<i>Mike Stone</i>
<b>START DATE</b>	<i>12-Feb-08</i>	<b>DRILLING METHOD</b>	<i>HSA</i>
<b>FINISH DATE</b>	<i>13-Feb-08</i>	<b>HYDROGEOLOGIST</b>	<i>C. Melson</i>

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
<u>80'-85'</u>	SILTY-SAND, tan with gravel sized quartzite rock.	SW	3.2	
85				
<u>85.5'-86'</u>	CLAY, red brown, lean, firm and dense. Contains caliche. Note: Layer of rock between 86-87', could not push sample, drilled to 90 ft for next sample push.	CL	n/a	
90				
<u>90'-115'</u>	SILTY-SAND, fine grained, tan/brown, and densely packed. Dry.	SM	2.0	
			n/a	
95			1.6	
			n/a	
100			2.4	
			n/a	
105			1.6	
			n/a	
110			0.9	
			n/a	
<u>115</u>		0.3	Sample F14-SB-6(113-115)	
		n/a	Geotech Sample F14-SB-6(115-116.5)	
120	Total Depth = 116.5 ft bgs.			

All depths are in feet below grade.

SHEET **3** OF **3**

## BORING LOG

<b>CLIENT</b> <u>USACE - Tulsa District</u>		<b>PROJECT #</b> <u>5285-027</u>	
<b>PROJECT</b> <u>FB-14 Oro Grande Landfill</u>		<b>DRILLING CONTRACTOR</b> <u>Enviro-Drill</u>	
<b>LOCATION</b> <u>Oro Grande, NM</u>		<b>DRILLER</b> <u>Mike Stone</u>	
<b>START DATE</b> <u>12-Feb-08</u>		<b>DRILLING METHOD</b> <u>HSA</u>	
<b>FINISH DATE</b> <u>12-Feb-08</u>		<b>HYDROGEOLOGIST</b> <u>C. Melson</u>	

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
0-5'	SAND, coarse grained with gravel mixed throughout, loosely packed, red-orange.	SW	2.7	Sample F14-SB-7(0-1)
5'-10'	SAND, fine grained tan. Gravel throughout and root fragments present. Dry.		2.1	
10	Total Depth = 10.0 ft bgs.			
15				
20				
25				
30				

All depths are in feet below grade.

SHEET 1 OF 1

## BORING LOG

<b>CLIENT</b> <u>USACE - Tulsa District</u>		<b>PROJECT #</b> <u>5285-027</u>	
<b>PROJECT</b> <u>FB-14 Oro Grande Landfill</u>		<b>DRILLING CONTRACTOR</b> <u>Enviro-Drill</u>	
<b>LOCATION</b> <u>Oro Grande, NM</u>		<b>DRILLER</b> <u>Mike Stone</u>	
<b>START DATE</b> <u>12-Feb-08</u>		<b>DRILLING METHOD</b> <u>HSA</u>	
<b>FINISH DATE</b> <u>12-Feb-08</u>		<b>HYDROGEOLOGIST</b> <u>C. Melson</u>	

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
0-5'	SAND, fine grained, loosely packed, red-orange. Coarse grained gravel mixed throughout.	SW	2.7	Sample F14-SB-8(0-1)
5'-10'	SAND, fine grained, tan. Gravel mixed throughout. Dry.		2.1	
Total Depth = 10.0 ft bgs.				

All depths are in feet below grade.

SHEET 1 OF 1

# **Waste Trench Logs**

## TRENCHING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	5285-027		
<b>PROJECT</b>	Oro Grande Landfill	<b>CONTRACTOR</b>	D&H		
<b>LOCATION</b>	Orogrande NM	<b>EXCAVATION METHOD</b>	Backhoe		
<b>START DATE</b>	02/12/08	<b>OPERATOR</b>	Sergio Payan		
<b>FINISH DATE</b>	02/12/08	<b>MPI PERSONNEL</b>	Joe Anzaldua		

DEPTH	DESCRIPTION	USCS	PID	NOTES
	Silt, light brown, dry, cobbles.			This trench to top of trash layer only in search of trash cell since unable to find with original T-1 location.
5	Concrete, glass, wiring, roofing materials			
10	TD = 6'			
15				

Notes:	Trench Dimensions:	47' L X 3' W X 5' D
	Depth to waste:	4'
	Waste Layer Thickness:	approximately 2'
	Types of Waste:	Concrete, glass, wiring, roofing materials
	Location of waste within trench:	approximately 6' from south end of trench

All depths are in feet below grade.

SHEET

1 of 15



## TRENCHING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	5285-027		
<b>PROJECT</b>	Oro Grande Landfill	<b>CONTRACTOR</b>	D&H		
<b>LOCATION</b>	Orogrande NM	<b>EXCAVATION METHOD</b>	Backhoe		
<b>START DATE</b>	02/12/08	<b>OPERATOR</b>	Sergio Payan		
<b>FINISH DATE</b>	02/12/08	<b>MPI PERSONNEL</b>	Joe Anzaldua		

DEPTH	DESCRIPTION	USCS	PID	NOTES
	Silt, light brown, dry, cobbles.			
	-----			
5	Plastic, plastic webbing.			
	Silt, light brown, dry, cobbles.			
	TD = 6'			
10				
15				

Notes:	Trench Dimensions: 35' L X 3' W X 6' D Depth to waste: 4' Waste Layer Thickness: 1' Types of Waste: Plastics Location of waste within trench: approximately 8' from West end of trench Orientation of Trench: E to W
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All depths are in feet below grade.

SHEET

2 of 15

## TRENCHING LOG

<b>CLIENT</b>	<u>USACE - Tulsa District</u>	<b>PROJECT #</b>	<u>5285-027</u>		
<b>PROJECT</b>	<u>Oro Grande Landfill</u>	<b>CONTRACTOR</b>	<u>D&amp;H</u>		
<b>LOCATION</b>	<u>Orogrande NM</u>	<b>EXCAVATION METHOD</b>	<u>Backhoe</u>		
<b>START DATE</b>	<u>02/13/08</u>	<b>OPERATOR</b>	<u>Sergio Payan</u>		
<b>FINISH DATE</b>	<u>02/13/08</u>	<b>MPI PERSONNEL</b>	<u>Joe Anzaldua</u>		
<b>DEPTH</b>	<b>DESCRIPTION</b>		<b>USCS</b>	<b>PID</b>	<b>NOTES</b>
	Silt, sand, light brown, dry.				
	-----				
5	Sandbags, paper, plastics, caulking tubes.				
	-----				
	Silt, light brown, dry, cobbles.				
	-----				
10	TD = 7.5'				
	-----				
15					
	Notes: Trench Dimensions: 16.5' L X 3' W X 7.5' D				
	Depth to waste: 3'				
	Waste Layer Thickness: approximately 1.5'				
	Types of Waste: Sandbags, paper, plastics, caulking tubes.				
	Orientation of Trench: E to W				
	End of Waste: approximately 1' from east end of trench				

All depths are in feet below grade.

**SHEET**

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## TRENCHING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	5285-027		
<b>PROJECT</b>	Oro Grande Landfill	<b>CONTRACTOR</b>	D&H		
<b>LOCATION</b>	Orogrande NM	<b>EXCAVATION METHOD</b>	Backhoe		
<b>START DATE</b>	02/13/08	<b>OPERATOR</b>	Sergio Payan		
<b>FINISH DATE</b>	02/13/08	<b>MPI PERSONNEL</b>	Joe Anzaldua		

DEPTH	DESCRIPTION	USCS	PID	NOTES
5	Silt, light brown, dry, cobbles.  Trashbags, plastics, strapping material, bottle.			
10	Silt, light brown, dry, cobbles. TD = 6'			
15	Trashbags, plastics, strapping material, bottle. TD = 10'			

Notes:	<p>Trench Dimensions: 55' L X 3' W X 6' D to 10' D</p> <p>Depth to waste: 1' bgs at West end, 7 bgs at East end of trench</p> <p>Waste Layer Thickness: 1' to 6'</p> <p>Types of Waste: Trashbags, plastics, strapping material, bottle.</p> <p>Orientation of Trench: West to East</p> <p>End of Waste: approximately 2' from West end of trench, 3' from east end.</p> <p> *Trench not drawn to scale. Subsurface elevation changes may be more gradual than depicted here.</p>
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All depths are in feet below grade.

SHEET

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## TRENCHING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	5285-027		
<b>PROJECT</b>	Oro Grande Landfill	<b>CONTRACTOR</b>	D&H		
<b>LOCATION</b>	Orogrande NM	<b>EXCAVATION METHOD</b>	Backhoe		
<b>START DATE</b>	02/13/08	<b>OPERATOR</b>	Sergio Payan		
<b>FINISH DATE</b>	02/13/08	<b>MPI PERSONNEL</b>	Joe Anzaldua		

DEPTH	DESCRIPTION	USCS	PID	NOTES
5	Silt, sand, cobbles, light brown, dry.			
10	Wiring, tire, debris			
15	TD = 12' Caliche, silt.			

Notes:

Trench Dimensions: 15L X 3W X 12D

Depth to waste: 10'

Waste Layer Thickness: 2'

Types of Waste: Wiring, tire, debris

Orientation of Trench: W to E

End of Waste: approximately 6' from west end of trench

All depths are in feet below grade.

SHEET

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## TRENCHING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	5285-027		
<b>PROJECT</b>	Oro Grande Landfill	<b>CONTRACTOR</b>	D&H		
<b>LOCATION</b>	Orogrande NM	<b>EXCAVATION METHOD</b>	Backhoe		
<b>START DATE</b>	02/13/08	<b>OPERATOR</b>	Sergio Payan		
<b>FINISH DATE</b>	02/13/08	<b>MPI PERSONNEL</b>	Joe Anzaldua		

DEPTH	DESCRIPTION	USCS	PID	NOTES
	Silt, cobbles, light brown, dry.			
5	Glass bottles, plastic strapping material.			
10				
15	TD = 10' Silt, rock, caliche			

Notes:	Trench Dimensions: 17' L X 3' W X 10' D Depth to waste: 4' Waste Layer Thickness: 5' Types of Waste: Glass bottles, plastic strapping material. Orientation of Trench: W to E End of Waste: approximately 2' from west end of trench
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All depths are in feet below grade.

SHEET

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## TRENCHING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	5285-027		
<b>PROJECT</b>	Oro Grande Landfill	<b>CONTRACTOR</b>	D&H		
<b>LOCATION</b>	Orogrande NM	<b>EXCAVATION METHOD</b>	Backhoe		
<b>START DATE</b>	02/13/08	<b>OPERATOR</b>	Sergio Payan		
<b>FINISH DATE</b>	02/13/08	<b>MPI PERSONNEL</b>	Joe Anzaldua		

DEPTH	DESCRIPTION	USCS	PID	NOTES
5	Silt, sand, light brown, dry.			
	Spray can, oil absorbent rags, truck axle, trash bags, plastic			
10	TD = 9' Silt, rock, caliche			
15				

Notes:	Trench Dimensions: 32' L X 3' W X 9' D Depth to waste: 6' Waste Layer Thickness: 3' Types of Waste: Spray can, oil absorbent rags, truck axle, trash bags, plastic Orientation of Trench: E to W End of Waste: approximately 3' from west end of trench
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All depths are in feet below grade.

SHEET

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## TRENCHING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	5285-027		
<b>PROJECT</b>	Oro Grande Landfill	<b>CONTRACTOR</b>	D&H		
<b>LOCATION</b>	Orogrande NM	<b>EXCAVATION METHOD</b>	Backhoe		
<b>START DATE</b>	02/13/08	<b>OPERATOR</b>	Sergio Payan		
<b>FINISH DATE</b>	02/13/08	<b>MPI PERSONNEL</b>	Joe Anzaldua		

DEPTH	DESCRIPTION	USCS	PID	NOTES
5	Silt, light brown, dry, cobbles.			
	Roofing paper, wiring			
10	Silt, light brown, dry, cobbles.			
	TD = 6'			
15				

Notes:	Trench Dimensions:	11' L X 3' W X 6' D
	Depth to waste:	2'
	Waste Layer Thickness:	1'
	Types of Waste:	paper, wiring
	Orientation of Trench:	W to E
	End of Waste:	approximately 6' from west end of trench

All depths are in feet below grade.

SHEET

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## TRENCHING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	5285-027		
<b>PROJECT</b>	Oro Grande Landfill	<b>CONTRACTOR</b>	D&H		
<b>LOCATION</b>	Orogrande NM	<b>EXCAVATION METHOD</b>	Backhoe		
<b>START DATE</b>	02/13/08	<b>OPERATOR</b>	Sergio Payan		
<b>FINISH DATE</b>	02/13/08	<b>MPI PERSONNEL</b>	Joe Anzaldua		

DEPTH	DESCRIPTION	USCS	PID	NOTES
	Silt, light brown, dry, cobbles.			
	Copper Wiring			
5	TD = 4'			
	Silt, light brown, dry, cobbles.			
	Copper Wiring			
	TD = 7'			
10				
15				

Notes:

Trench Dimensions: 49' L X 3' W X 4' D to 7' D  
Depth to waste: 1' bgs at North end, 6 bgs at South end of trench  
Waste Layer Thickness: 1' to 5'  
Types of Waste: Metal, sheetrock, duct tape, plastic, trash bags, sand bags  
Orientation of Trench: South to north  
End of Waste: ~ 41' from south end of trench

\*Trench not drawn to scale. Subsurface elevation changes may be more gradual than depicted here.

All depths are in feet below grade.

SHEET

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## TRENCHING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	5285-027		
<b>PROJECT</b>	Oro Grande Landfill	<b>CONTRACTOR</b>	D&H		
<b>LOCATION</b>	Orogrande NM	<b>EXCAVATION METHOD</b>	Backhoe		
<b>START DATE</b>	02/13/08	<b>OPERATOR</b>	Sergio Payan		
<b>FINISH DATE</b>	02/13/08	<b>MPI PERSONNEL</b>	Joe Anzaldua		

DEPTH	DESCRIPTION	USCS	PID	NOTES
5	Silt, light brown, dry, cobbles.  Plastic, styrofoam, plastic netting, trash bags metal strapping material			
10	TD = 6' Silt, light brown, dry, cobbles.			
15				

<div style="text-align: center;">Notes:</div> <div style="text-align: center;">Trench Dimensions: 10' L X 3' W X 6' D</div> <div style="text-align: center;">Depth to waste: 2'</div> <div style="text-align: center;">Waste Layer Thickness: 4'</div> <div style="text-align: center;">Types of Waste: Plastic, trash bags, metal.</div> <div style="text-align: center;">Orientation of Trench: E to W</div> <div style="text-align: center;">End of Waste: approximately 10 from east end of trench</div>	

All depths are in feet below grade.

SHEET

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## TRENCHING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	5285-027		
<b>PROJECT</b>	Oro Grande Landfill	<b>CONTRACTOR</b>	D&H		
<b>LOCATION</b>	Orogrande NM	<b>EXCAVATION METHOD</b>	Backhoe		
<b>START DATE</b>	02/13/08	<b>OPERATOR</b>	Sergio Payan		
<b>FINISH DATE</b>	02/13/08	<b>MPI PERSONNEL</b>	Joe Anzaldua		

DEPTH	DESCRIPTION	USCS	PID	NOTES
5	Silt, light brown, dry, cobbles. ----- Plastic, styrofoam, plastic netting, trash bags metal strapping material ----- Silt, light brown, dry, cobbles.			
10	TD = 6'			
15				

<div style="text-align: center;">Notes:</div> <div style="text-align: center;">Trench Dimensions: 22' L X 3' W X 6' D</div> <div style="text-align: center;">Depth to waste: 2.5'</div> <div style="text-align: center;">Waste Layer Thickness: 3'</div> <div style="text-align: center;">Types of Waste: Plastic, styrofoam, plastic netting, trash bags, metal strapping</div> <div style="text-align: center;">Orientation of Trench: E to W</div> <div style="text-align: center;">End of Waste: approximately 8 from east end of trench</div>	

All depths are in feet below grade.

SHEET

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## TRENCHING LOG

<b>CLIENT</b>	<u>USACE - Tulsa District</u>	<b>PROJECT #</b>	<u>5285-027</u>		
<b>PROJECT</b>	<u>Oro Grande Landfill</u>	<b>CONTRACTOR</b>	<u>D&amp;H</u>		
<b>LOCATION</b>	<u>Orogrande NM</u>	<b>EXCAVATION METHOD</b>	<u>Backhoe</u>		
<b>START DATE</b>	<u>02/13/08</u>	<b>OPERATOR</b>	<u>Sergio Payan</u>		
<b>FINISH DATE</b>	<u>02/13/08</u>	<b>MPI PERSONNEL</b>	<u>Joe Anzaldua</u>		
<b>DEPTH</b>	<b>DESCRIPTION</b>		<b>USCS</b>	<b>PID</b>	<b>NOTES</b>
	Silt, light brown, dry, cobbles.				
	-----				
5	Trash Layer: Copper Wiring				
	-----				
	Silt, light brown, dry, cobbles.				
	-----				
10	TD = 7'				
	-----				
15					
	Notes:                      Trench Dimensions:    17' L X 3' W X 7' D Depth to waste:        3' Waste Layer Thickness: 2' Types of Waste:        Copper wiing Orientation of Trench: E to W End of Waste:          approximately 1' from east end of trench				

All depths are in feet below grade.

**SHEET**

12 of 15

## TRENCHING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	5285-027		
<b>PROJECT</b>	Oro Grande Landfill	<b>CONTRACTOR</b>	D&H		
<b>LOCATION</b>	Orogrande NM	<b>EXCAVATION METHOD</b>	Backhoe		
<b>START DATE</b>	02/13/08	<b>OPERATOR</b>	Sergio Payan		
<b>FINISH DATE</b>	02/13/08	<b>MPI PERSONNEL</b>	Joe Anzaldua		

DEPTH	DESCRIPTION	USCS	PID	NOTES
	Silt, light brown, dry, cobbles.			
	Concrete rubble, razor wire, plastics.			
5	Silt, light brown, dry, cobbles.			
	TD = 6'			
10				
15				

<div style="text-align: center;">Notes:</div>	Trench Dimensions:	12' L X 3' W X 6' D
	Depth to waste:	1'
	Waste Layer Thickness:	3'
	Types of Waste:	Concrete and asphalt debris
	Orientation of Trench:	E to W
	End of Waste:	approximately 4 from east end of trench

All depths are in feet below grade.

**SHEET**

**13 of 15**

## TRENCHING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	5285-027		
<b>PROJECT</b>	Oro Grande Landfill	<b>CONTRACTOR</b>	D&H		
<b>LOCATION</b>	Orogrande NM	<b>EXCAVATION METHOD</b>	Backhoe		
<b>START DATE</b>	02/13/08	<b>OPERATOR</b>	Sergio Payan		
<b>FINISH DATE</b>	02/13/08	<b>MPI PERSONNEL</b>	Joe Anzaldua		

DEPTH	DESCRIPTION	USCS	PID	NOTES
5	Silt, light brown, dry, cobbles.			
	-----			
	Concrete rubble, razor wire, plastics.			
	-----			
10	Silt, light brown, dry, cobbles.			
	-----			
15	TD = 7'			
	-----			

Notes:	Trench Dimensions:	13.5' L X 3' W X 7' D
	Depth to waste:	2'
	Waste Layer Thickness:	3'
	Types of Waste:	Concrete rubble, razor wire, plastics.
	Orientation of Trench:	E to W
	End of Waste:	approximately 7.5 from east end of trench

All depths are in feet below grade.

SHEET

14 of 15

## TRENCHING LOG

<b>CLIENT</b>	<i>USACE - Tulsa District</i>	<b>PROJECT #</b>	5285-027		
<b>PROJECT</b>	Oro Grande Landfill	<b>CONTRACTOR</b>	D&H		
<b>LOCATION</b>	Orogrande NM	<b>EXCAVATION METHOD</b>	Backhoe		
<b>START DATE</b>	02/13/08	<b>OPERATOR</b>	Sergio Payan		
<b>FINISH DATE</b>	02/13/08	<b>MPI PERSONNEL</b>	Joe Anzaldua		

DEPTH	DESCRIPTION	USCS	PID	NOTES
5	Silt, light brown, dry, cobbles.			
	-----			
	Trash Layer: Plastics, wood debris			
	-----			
10	Silt, light brown, dry, cobbles.			
	TD = 6'			
15				

Notes:	Trench Dimensions:	18' L X 3' W X 6' D
	Depth to waste:	2'
	Waste Layer Thickness:	3'
	Types of Waste:	Plastic, wood
	Orientation of Trench:	SE to NW
	End of Waste:	Approximately 10' from SE portion of trench moving NW

All depths are in feet below grade.

SHEET

15 of 15



# Photographic Log

**Property Name:**

Oro Grande Landfill–SWMU-25/FTBL-14

**Location:**

Fort Bliss, Oro Grande, New Mexico

**Project No.**

5285027

**Photo No.****1****Date:**

2/12/08

**Direction Photo****Taken:**

Northwest

**Description:**

A general view of the Oro Grande Landfill site. The landfill can be identified by the barren or cleared area in the center of the photograph.

**Property Name:**

Oro Grande Landfill–SWMU-25/FTBL-14

**Location:**

Fort Bliss, Oro Grande, New Mexico

**Project No.**

5285027

**Photo No.****2****Date:**

2/12/08

**Direction Photo****Taken:**

South

**Description:**

A view of the exploratory trenching activities.



**Property Name:**

Oro Grande Landfill–SWMU-25/FTBL-14

**Location:**

Fort Bliss, Oro Grande, New Mexico

**Project No.**

5285027

**Photo No.****3****Date:**

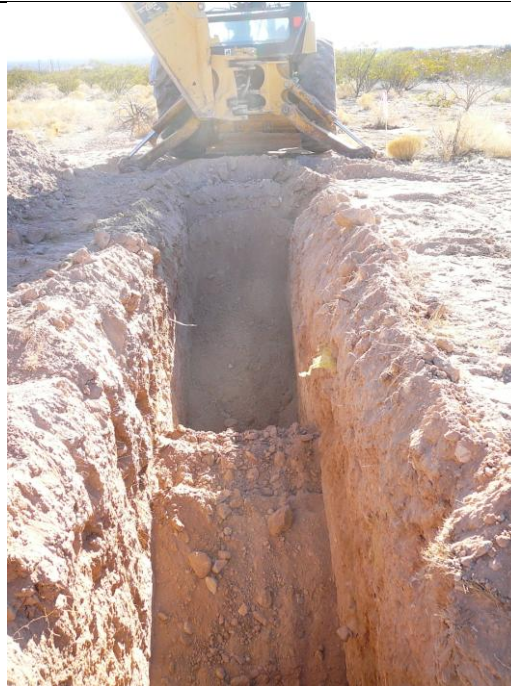
2/12/08

**Direction Photo****Taken:**

South

**Description:**

A view of the  
exploratory trench  
F14-T-1.

**Property Name:**

Oro Grande Landfill–SWMU-25/FTBL-14

**Location:**

Fort Bliss, Oro Grande, New Mexico

**Project No.**

5285027

**Photo No.****4****Date:**

2/13/08

**Direction Photo****Taken:**

West

**Description:**

A view of exploratory  
trench F14-T-3, note  
the exposed layer of  
waste on the back wall.





## PHOTOGRAPHIC LOG


<b>Property Name:</b> Oro Grande Landfill–SWMU-25/FTBL-14		<b>Location:</b> Fort Bliss, Oro Grande, New Mexico	<b>Project No.</b> 5285027
<b>Photo No.</b> <b>5</b>	<b>Date:</b> 2/13/08		
<b>Direction Photo Taken:</b> Towards ground			
<b>Description:</b>  Typical waste debris excavated from the exploratory trenches.			

## PHOTOGRAPHIC LOG


<b>Property Name:</b> Oro Grande Landfill–SWMU-25/FTBL-14		<b>Location:</b> Fort Bliss, Oro Grande, New Mexico	<b>Project No.</b> 5285027
<b>Photo No.</b> <b>6</b>	<b>Date:</b> 2/13/08		
<b>Direction Photo Taken:</b> North			
<b>Description:</b>  A view of exploratory trench F14-T-9. Note the plastic trash bags in the bottom of the trench.			



## PHOTOGRAPHIC LOG

<b>Property Name:</b> Oro Grande Landfill–SWMU-25/FTBL-14		<b>Location:</b> Fort Bliss, Oro Grande, New Mexico	<b>Project No.</b> 5285027
<b>Photo No.</b> <b>7</b>	<b>Date:</b> 2/13/08		
<b>Direction Photo Taken:</b> Towards ground			
<b>Description:</b>  A side profile view of exploratory trench F14-T-9. Note the layer of waste debris just beneath the surface.			

## PHOTOGRAPHIC LOG

<b>Property Name:</b> Oro Grande Landfill–SWMU-25/FTBL-14		<b>Location:</b> Fort Bliss, Oro Grande, New Mexico	<b>Project No.</b> 5285027
<b>Photo No.</b> <b>8</b>	<b>Date:</b> 2/12/08		
<b>Direction Photo Taken:</b> Towards ground			
<b>Description:</b>  A view of the ground surface in the former tar material area. Note the black tar fragments on the surface.			



**Property Name:**

Oro Grande Landfill–SWMU-25/FTBL-14

**Location:**

Fort Bliss, Oro Grande, New Mexico

**Project No.**

5285027

**Photo No.****9****Date:**

2/12/08

**Direction Photo****Taken:**

South

**Description:**

A view of drilling boring F14-SB-7 in the former tar material area.

**Property Name:**

Oro Grande Landfill–SWMU-25/FTBL-14

**Location:**

Fort Bliss, Oro Grande, New Mexico

**Project No.**

5285027

**Photo No.****10****Date:**

2/12/08

**Direction Photo****Taken:**

North

**Description:**

A view of drilling the deep boring F14-SB-6 on the south side of the landfill.



**Property Name:**

Oro Grande Landfill–SWMU-25/FTBL-14

**Location:**

Fort Bliss, Oro Grande, New Mexico

**Project No.**

5285027

**Photo No.**

11

**Date:**

2/13/08

**Direction Photo****Taken:**

South

**Description:**

A view of drilling the boring F14-SB-1 on the northern end of the landfill.

**Property Name:**

Oro Grande Landfill–SWMU-25/FTBL-14

**Location:**

Fort Bliss, Oro Grande, New Mexico

**Project No.**

5285027

**Photo No.**

12

**Date:**

2/14/08

**Direction Photo****Taken:**

East

**Description:**

A view of drilling angled boring F14-SB-3. The boring was drilled at a 30 degree angle to obtain samples from beneath the landfill.





<b>Property Name:</b> Oro Grande Landfill–SWMU-25/FTBL-14		<b>Location:</b> Fort Bliss, Oro Grande, New Mexico	<b>Project No.</b> 5285027
<b>Photo No.</b> <b>13</b>	<b>Date:</b> 2/15/08		
<b>Direction Photo Taken:</b> North			
<b>Description:</b> A view of drilling angled boring F14-SB-2 on the northeastern end of the landfill.			

<b>Property Name:</b> Oro Grande Landfill–SWMU-25/FTBL-14		<b>Location:</b> Fort Bliss, Oro Grande, New Mexico	<b>Project No.</b> 5285027
<b>Photo No.</b> <b>14</b>	<b>Date:</b> 2/16/08		
<b>Direction Photo Taken:</b> South			
<b>Description:</b> A view of the Oro Grande landfill after completion of field activities.			

## **Field Notes**

Field Notes

EB 14 Oro Grande Landfill

5285-027



2/12/08 - Arrive MacGregor base camp For UXO training & uel. registration at 8:00 am.

Arrive on site around 10:00 am, begin surveying & trenching

1:30 pm Started 10 Ft Borings in Tar Area, 4:00 pm Start deep boring mid 60's Sunny, w/ varying winds

2/13/08 - Arrive at site 8:10 am, continue deep boring, complete ~~2~~ two 30 Ft verticle Borings Sunny mid 60's varying winds

2/14/08 - Arrive at site at 8:20 am. Driller set rig for directional borings until ~~11:00~~ 11:30. Driller set rig at wrong 30° angle (off surface, not from verticle). Reset rig to correct angle Started drilling at 1:30 pm

3:50 pm Rig Shifted - Spent rest of day trying to get rig back into place. Left site at 5:30 pm Sunny mid 60's varying winds.

2/15/08 - Arrive at site 7:00 am Finished 1st Dir. Boring started 2nd Dir Boring at 9:00 - ~~started~~ started drilling at 9:45 ~~start~~ Rig hit boulder at 15 ft, could not pass. moved rig 5 ft laterally to south of first bldg. Started 3rd Dir Boring @ 3:15, drilling by 4:00 pm. Finished boring 7:00 pm.

2/16/08 - Arrive at site 6:45 am. Driller pulled Auger From last Dir Boring, then grouted borings

★ ★ Note = IDW drums were not clean, several labeled ★ ★ "purge water" from LPST sites, one labeled to have contained "55-gallons diesel fuel", another "diesel fuel & sludge" - Condensation on inside of drums, sludge in bottom pane - all had strong petroleum odor. did not realize this until late Wed Afternoon.

## BORING LOG

Boring ID: **B -**

**F14-SB-1**

CLIENT	PROJECT #
PROJECT F14	DRILLING CONTRACTOR Enviros Drilling
LOCATION 000 Grade	DRILLER
START DATE 2/13/08 4:30 pm	DRILLING METHOD HSA
FINISH DATE 2/13/08	HYDROGEOLOGIST C. Anderson

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
0-5	tan/red sand fine grained some chalky caliche + some s. bed gravel F14-SB-1 (0-2) @ 4:35 pm		0.0	@ 0-5
5-10	tan/red sand fine grained w/ gravel caliche from base		0.0	@ 5-10
10-15	tan/red sand fine grained to 14.0 ft 14-15 tan sand w/ abundant caliche very hard + dense F14-SB-1 (13-15) @ 4:45 pm		0.0	@ 13-15
15-20	tan/red sand fine grained w/ abundant caliche + rock (gravel) dense firm		0.0	@ 15-20
20-25	lt tan/red sand fine grained w/ chalky caliche - firm + dense		0.0	@ 20-25
25-30	lt tan/reddish sand fine grained, firm chalky caliche + rock s. bed gravel throughout F14-SB-1 (28-30) @ 4:15 TD: 30.0 ft Dop 3 QA from SB-1 (28-30)		0.0	@ 25-30

All depths are in feet below grade.

SHEET

OF

## BORING LOG

Boring ID: **B -**

F14-SB-2 Directional

CLIENT		PROJECT #	
PROJECT <u>F14</u>		DRILLING CONTRACTOR <u>Enviro Drill</u>	
LOCATION <u>000 Grade Level</u>		DRILLER <u>M. K. Estess</u>	
START DATE <u>2/15/08</u> <del>2:30pm</del> <u>set on 2/15/08</u>		DRILLING METHOD <u>HSA - Dir</u>	
FINISH DATE <u>2/16</u>		HYDROGEOLOGIST <u>C. Nelson</u>	

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
	3:15 Rig set on B location, Prep rig & Position Drilling at 3:40, Rig Issues 1st sample at 4:35		0.0 @ 0-5	
	0-5 - 4:37 pm F14-SB-2 (0-2) * 1 Kit 2 Jar & tan sand & gravel mix, Root Frag.		0.0 @ 5-10	
	5-10 - 4:50 - Tan sand gravel mix - sand fine grained		0.0 @ 10-15	
	10-15 Tan/red sand fine grained loose packed F14-SB-2 (10-15) @ 5:05 1 Kit 2 Bottle		0.0 @ 15-20	
	15-20 Tan/red sand fine grained w/ cherty caliche white & black frag		0.0 @ 20-25	
	20-25 - See as above		0.0 @ 25-30	
	25-30 30-35 - See as above			
	30-35 35-40 - See as above			
	F14 SB-2 (28-30) @ 7:00pm			
	TD 300 ft vert 35 ft angle End C 7:00pm			

All depths are in feet below grade.

SHEET

OF

## BORING LOG

Boring ID: **B -**

FB-SB-3 Directional Boring

CLIENT _____		PROJECT # _____	
PROJECT _____		DRILLING CONTRACTOR <u>Enviro-Drill</u>	
LOCATION _____		DRILLER <u>Mike Stone?</u>	
START DATE <u>2/14/08 11:30 - 2:00</u> <u>Sunny Windy</u>		DRILLING METHOD <u>HST</u>	
FINISH DATE <u>2/15/08</u> <u>6:00</u>		HYDROGEOLOGIST <u>C. Nelson</u>	

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
0-5	11:30 - 11:30 Driller setting rig 11:30 - 11:30 - Repositioning rig 0-5 ft 1/4 tan sand + gravel mix - coarse grained w/ large rocks FH-SB-3 (0-2) @ 2:30 2/14/08 1 kit 1 bar		0.0 @ 0-5	
5-10	1/4 tan sand grades to 1/4 tan reddish sand fine grained chalky calcine loose packed		0.0 @ 5-10	
10-15	1/4 tan/red (pink) sand fine grained w/ chalky calcine		0.0 @ 10-15	
15-20	1/4 tan/red (pink) sand fine grained chalky calcine abundant from 17-20 ft finer dense white		0.0 @ 15-20	
20-25	Rig Shifted @ 3:50 - Driller spent 1.5 hr Rig back to place immediately 5:30 pm 2/14/08 Arrivesite 7:05 am Fri 2/15 continue SB-3 tan/red sand w/ chalky calcine gravel		0.0 @ 20-25	
25-30	tan/red sand fine grained w/ large rocks Boulders throughout (fig 100)		0.0 @ 25-30	
30-35	Same as above			
35-40	Same as above			
40-45	Same as above			
45-50	Same as above			
50-55	Same as above			
55-60	Same as above			
60-65	Same as above			
65-70	Same as above			
70-75	Same as above			
75-80	Same as above			
80-85	Same as above			
85-90	Same as above			
90-95	Same as above			
95-100	Same as above			

FD = 30.0 ft vertical  
35.0 ft angle

Comp IDW - @ 4:55 PM 2/14/08

All depths are in feet below grade.

SHEET

OF



## BORING LOG

Boring ID: **B -**

**F14-SB-4**

CLIENT		PROJECT #	
PROJECT <b>F814</b>		DRILLING CONTRACTOR <b>Buried Drill</b>	
LOCATION <b>ORC Grade Landfill</b>		DRILLER <b>Wes Stone</b>	
START DATE <b>3:24 PM 2/13/08 Sunny 65°</b>		DRILLING METHOD <b>Hand</b>	
FINISH DATE <b>2/13/08 Wind - light</b>		HYDROGEOLOGIST <b>C. Nelson</b>	

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
0-5	Tan Sand loose packed chalky caliche gravel * F814-SB4 (0-2) * 3:25 PM		0.0	@ 0-5
5-10	tan (reddish) Sand loose packed chalky caliche		0.5	@ 5-10
10-15	tan (reddish) Sand loose packed Fine grained w/ coarse grained gravel * F8-14-SB (13-15) @ 3:37 PM *		0.0	@ 10-15
15-20	tan/red sand loose packed caliche (chalky) abundant @ 17-20 ft Firm + Dense		0.7	@ 15-20
20-25	tan reddish sand loose packed w/ gravel sized rocks + chalky caliche very dense at 25 ft		0.3	@ 20-25
25-30	F14-SB4 (28-30) @ 3:55 PM Seems above Dup #2 @ SB.4 28-30' + QA		0.0	@ 25-30
<p>TD = 30.0 ft</p> <p>End 4:00 PM</p>				

All depths are in feet below grade.

SHEET

1 OF 2

## BORING LOG

Boring ID: **B -**

F14-SB-5 Directional

CLIENT		PROJECT #		
PROJECT <u>SB 14</u>		DRILLING CONTRACTOR <u>Enviro Drill</u>		
LOCATION <u>Oro Grande Landfill</u>		DRILLER <u>Mike Stone</u>		
START DATE <u>2/15/08 9:45 AM</u>		DRILLING METHOD <u>HSA 30°</u>		
FINISH DATE <u>2/15/08 Sunny Windy 60's</u>		HYDROGEOLOGIST <u>C. Nelson</u>		
DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
0-5	0-5 Ft - No Return 10:20 -- 0-5 second push second attempt Boring (see 10-15 Ft) 1 ft sand & gravel mix		0.0	0-5
5-10	5-10 - Tan/red (pink) Sand Fine grained w/gravel S. 7 inch Rock Frag. Compact 10:40		1.2	5-10
10-15	10-15 - tan/red sand Fine grained, compact 11:00 larger white boulder at 15 Ft, could not get past not to move rig laterally 6 Ft south F14-SB-5 (13-15) @ 11:00 1 kit 1 in		0.0	10-15
15-20	15-20 - 1 ft sand w/chalky white & gravel - 1:15 Compact - Firm		1.2	15-20
20-25	20-25 - 1 ft sand pack w/ig rock gravel to 1:30 Cobble sized (2 in)		0.0	@ 20-25
25-30	25-30 - 1 ft sand w/rock gravel, firm dense Similar to above		1.2	@ 25-30
30-35	30-35 - 1 ft tan/red sand <del>dark</del> chalky white 2:17 Chalky + lg rock frag gravel to cobbles very hard, compact. F14-SB-5 (28-30) TD = 30.0 ft Vert @ 2:17 35.0 ft angle 23° 1 kit		0.6	@ 30-35

All depths are in feet below grade.

SHEET 1 OF 1

start  
4:00 PM

## BORING LOG

Boring ID: **B -**

F14-SB-6

CLIENT		PROJECT #	
PROJECT	F14-SB-6 as grade	DRILLING CONTRACTOR	Enver B. Al
LOCATION	as grade level	DRILLER	Mike Sam
START DATE	2/12/08 2:30 PM 64' away	DRILLING METHOD	USA
FINISH DATE	2/13/08	HYDROGEOLOGIST	C. Nelson

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
0-5	1+ Brown <sup>(hr)</sup> Sand Fine grained w/ coarse grained gravel (chalky) F14-SB-6 (0-2) @		0.7 @ 0-5	
5-10	1+ Brown <sup>(hr)</sup> Sand Fine grained w/ coarse gravel (chalky) very dense + compact at 9-10 PM		0.0 @ 5-10	
10-15	1+ reddish tan Sand - Fine grained Compact + dense chalky gravel at 14.5-15.0 ft (caliche)		0.6 @ 10-15	
15-20	1+ reddish tan sand / compact dense chalky caliche abundant throughout		0.4 @ 15-20	
20-25	1+ tan Sand - Compact densely chalky caliche nodules throughout		1.3 @ 20-25	
25-30	Small Reddish - Fine grained Sand 1+ reddish tan loosely packed		1.5 @ 25-30	
30-35	30-31 Fine grained Sand 1+ red tan similar to 25-30 31-36 1+ tan sand compact w/ abundant chalky caliche throughout 36-38 Fine grained red tan sand w/ caliche + gravel one bit		1.6 @ 30-35	
35-40	35-40 Fine grained sand 1+ red tan to 37 ft dense layer of sand + caliche to 37.2 ft 37-40 ft Sand, caliche, + rock w/ (crustal) caliche Cont. next page		1.7 @ 35-40	

All depths are in feet below grade.

SHEET

1 OF 3

## BORING LOG

Boring ID: **B -**

F14-SB6 Cont.

CLIENT		PROJECT #		
PROJECT		DRILLING CONTRACTOR		
LOCATION		DRILLER		
START DATE		DRILLING METHOD		
FINISH DATE		HYDROGEOLOGIST		
DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
	40-45 - mix of gravel sized chunky calcareous sandstone & tan sand/silt Quartzite Cobble sized to small gravel Fine dense packed		0.0	@ 40-45
45				
	45-50 - mix of sand, calcareous gravel & quartzite Stone gravel to cobble sized, sand silt		0.3	45-50
	2/13 - arrival on site - 8:15 am drilling at 8:45 am			
50				
	50-55 - tan sand compact dense Quartzite Rock fragments intermixed due to site conditions, driller switched to small diameter split spoon & pushed 2 ft samples to 3 ft samples every foot.		2.8	50-55
55				
	55-57 - Brown sand - compact rock fragments mixed throughout, silty		2.6	55-57
	57-62 - tan sand loose packed		2.3	57-62
60				
	62-67 - tan sand loose packed silty		1.9	62-67
65				
	No sample drilled 3' pushed 2'			
70				
	70-72 See as above Quartzite mixed in			
75	75- See as above			
	See as above, silt content increasing			
80				
	Cont. next page			

All depths are in feet below grade.

SHEET

2 OF 3

## BORING LOG

F14-SB-6

CLIENT _____		PROJECT # _____	
PROJECT <u>SB UP</u>		DRILLING CONTRACTOR <u>Environ Dr. 11</u>	
LOCATION _____		DRILLER _____	
START DATE <u>2/12</u>		DRILLING METHOD <u>HSA</u>	
FINISH DATE <u>2/13</u>		HYDROGEOLOGIST <u>C. Nelson</u>	

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
	no sample 80-84			
85	84-86 - s. clay sand <del>some</del> tan, no to above but more silt. silt		3.2 @ 85 ft	
	86.5-86 - Clay red brown, some caliche			
	Rock at 86 stopped push drilled through rock layer to 90 ft			
90	Driller did not want to push sample through Rock layer		86-87 ft	
	90-92 - Silty Sand tan <del>less</del> dense packed		2.0 @ 91.0 ft	
	no sample 92-94			
95	94-95 - Brown - silty - sand Rock Requests Firm, dense		1.6 @ 95 ft	
	no sample 95-98			
100	98-100 - Brown silty sand fine grained compact		2.4 @ 99-100	
	no sample 100-103			
	103-105 - Brown <del>silty</del> silty sand fine grained dense		1.6 @ 103-105	
	no sample 105-108			
	108-110 Same as above		0.7 @ 108-110	
	no sample 110-113			
	SB F14-SB 6 - (113-115) Ⓢ			
115	113-115 - Brown silty sand same as above		0.3 @ 113-115	
	<div style="border: 1px solid black; padding: 5px; margin: 10px;"> <p>34 - 46 - <math>\frac{50}{5}</math> Blow Count (17 inches)</p> <p>Created at 115-116.5 ±</p> <p>TD = 116.5 ft</p> </div>			

All depths are in feet below grade.

SHEET

3 OF 3



## BORING LOG

Boring ID: **B -**

**F14-SB-7**

CLIENT		PROJECT #	
PROJECT <u>010 Grade</u>		DRILLING CONTRACTOR <u>EnviroDrill</u>	
LOCATION <u>010 Grade, NM</u>		DRILLER <u>EnviroDrill Mike Stone</u>	
START DATE <u>2/12/08 1:00pm</u>		DRILLING METHOD <u>HSA</u>	
FINISH DATE <u>2/12/08 6:40 Sunny</u>		HYDROGEOLOGIST <u>C. Nelson</u>	

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
0-5	red orange sand loosely packed gravel mixed in coarse grained		2.7 - 0-5 Ft	
5-10	Fine grained tan sand some gravel + Root fragments		2.1 - 5-10 Ft	
	TD = 10.0 ft			
	<del>Stop at SB-7</del> No enough sample return			
	F14-SB-7 (0-1)			

All depths are in feet below grade.

SHEET

OF

## BORING LOG

Boring ID: **B -**

F14-SB-8

CLIENT		PROJECT #	
PROJECT <u>260 Gordo, NM</u>		DRILLING CONTRACTOR	
LOCATION <u>Orangeada FB14</u>		DRILLER <u>Mike Stone</u>	
START DATE <u>1/12/88 1:40 pm</u>		DRILLING METHOD <u>HSA</u>	
FINISH DATE <u>1/12/88 2:10 pm</u>		HYDROGEOLOGIST <u>CR</u>	

DEPTH	SAMPLE DESCRIPTION	USCS	PID	NOTES
0-5 ft	Red coarse grained sand loosely packed gravel + Rock Frag Similar to SB-7		2.7	@ 0-5 ft
			2.1	@ 5-10
	J-10 - tan fine grained sand loose packed Similar to SB-7			
	TA			
	F-14-SB-8 (0-1) #			
	QA/QC - Dup of SB-8 (cont) #			
	TA 10.2 ft			
	2:05/2:10 Robert Lehnert RHB DOE Lorines			
	Bib			

All depths are in feet below grade.

SHEET

OF

BY JA DATE 2-11-08 SHEET NO. 1 OF 1  
CHKD. BY \_\_\_\_\_ DATE \_\_\_\_\_ JOB NO. 5285-027  
SUBJECT OLD GRANDE

## MONDAY

0530 - MOB TO AIRPORT

0610 - @ AIRPORT, CHECK-IN

0640 - DEPART

0920 - ARRIVE EL PASO LOCAL TIME = 0920

0900 - MOB TO EL PASO OFFICE

0930 - @ OFFICE, CALL SHANE. CALL BOB LEWIS

1030 - CALL SHANE, NO ANSWER. SPEAK TO SURVEYORS, @ SUB.  
NOTIFY SURVEYORS NO RESPONSE FROM SHANE TO CONDUCT JRS BRIEFING1200 - SPEAK TO DAVID BLACK / WORKS w/ SHANE. NEEDS PERSONNEL  
& VEHICLE INFO FOR RAPID ACCESS.

1300 - CONTACT SUBS TO GATHER DATA REQ'D.

1500 - SEND SPREADSHEET TO DAVID. SETUP VLO for 0900 @ MC WILSON

1630 - RECEIVING DATA FROM D &amp; K, SEND TO DAVID.

END DAY (1730 CST)



- 0700 - MOB to camp McCrehan - stop for supplies.  
 0815 - arrive @ camp McCrehan. Get veh. permits  
 0945 - LEAVE McCrehan, call BOB LEINHART - LEAVE MSG.  
 0950 - call RANGE CONTROL, SPEAK TO RANGE CONTROL OFFICER O.S.  
 RECEIVE VERBAL APPROVAL W/RE 043-24.  
 1005 - Arrive @ LANDFILL AREA, CUTS BEHIND SURVEY  
 ENVIRONMENTAL BEHIND TO SETUP FOR CONT. SAMPLING  
 D/H OFFROADS BACKHILL.  
 1130 - D/H TO OFFROAD DRAIN  
 1230 - D/H SETUP ON T-1

T-1

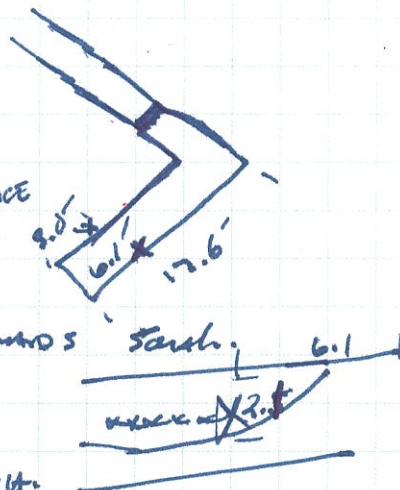
COVER - MOSTLY BARE, SOME SHRUBBERY.

SOIL - SILT, L. BROWN DTY, ROCKS TRACE

BURNED WOOD DEBRIS, DECOMPOSING ORGANICS

≈ 2.8' BLK to (X)

EXTEND TRENCH from depression towards South.



1350

T-2

BEGIN T-2. NOT SEEING DEFINITIVE TRASH.

BOBLEINHART &amp; LILIAN? ON-SITE.

DISCUSS POSSIBLE TRASH CELL.

DECIDE TO START @ DEPRESSION IN TOPOGRAPHY

D/H TO ≈ 4' FIND CONCRETE, GLASS BOTTLES, UNIKAH

Roofing Paper

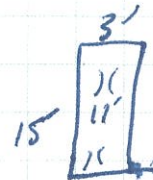
1500

T-3START IN CENTER OF DEPRESSION & EXCAVATE EAST & WEST  
TO OUTER PERIMETERENCOUNTER PLASTIC BAGS, STRAPPING, METAL @ 2.4' to 11'  
paper

0700 - MOB TO SITE, STOP for supplies.

0815 - @ SITE, call in to Kansas control.

0830 - send BACK @ SB-6 + T-5. T-5



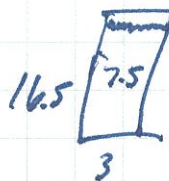
cover approx 10' silt, cobbles.

trash - wires, tire debris. (found 2 snakes)

bottom - caliche, silt.

0945 - BACKFILL T-5

1000 - T-3



trash = SANDPAPER, PAPER  
CAULKING TUBES  
~3' by 5' to 4.5'

cover = 3' silt, sand.

bottom = silt, rock, caliche

BACKFILL

1045 - T-6



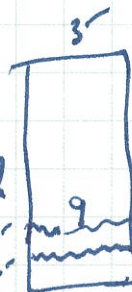
trash ~ 4.5' dia - 9'  
consists of GLASS, PLASTIC  
STRAPPING MATERIAL

cover = 4' silt, cobbles

bottom = silt, rock, caliche

1100 - BACKFILL

T-7



cover = 6' silt, cobble

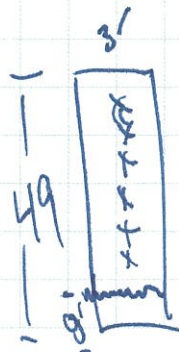
bottom = silt, cobble

backfill

trash = 6' dia

consists of spray can  
oil absorbent mat  
Axle, more trash, plastic

1200 T-9

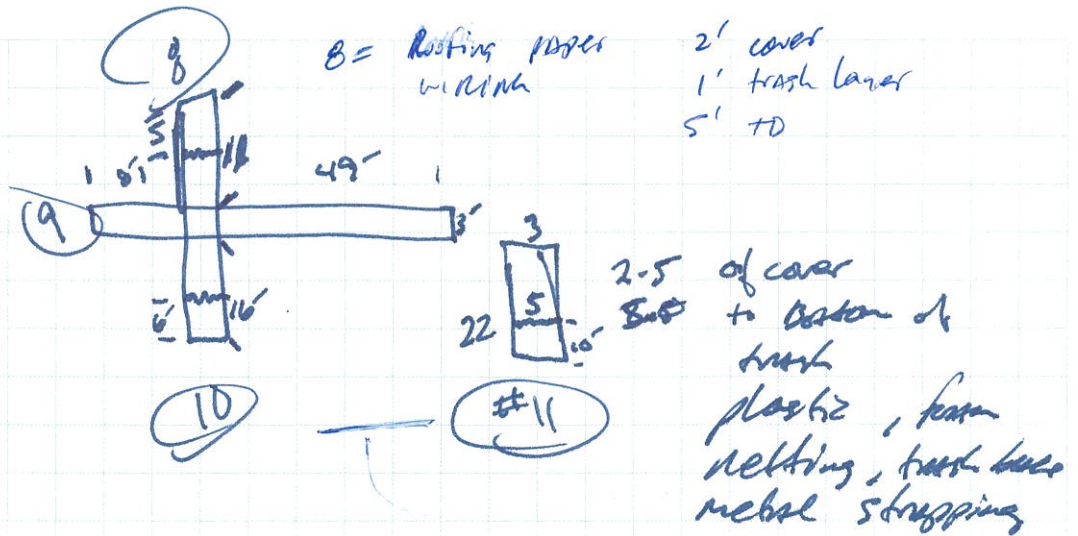


depth to trash

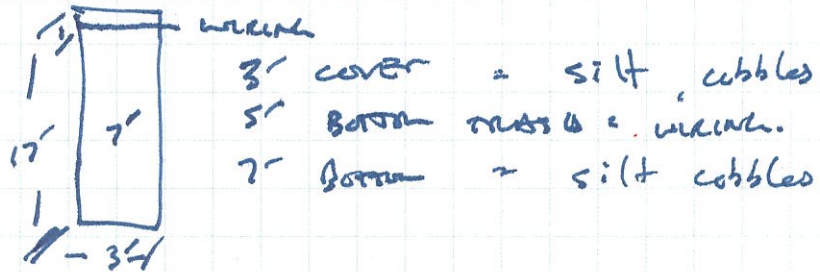
4 to 1' to trash

metal sheetrock  
duct tape plastic  
trash bags  
SAND BAGS

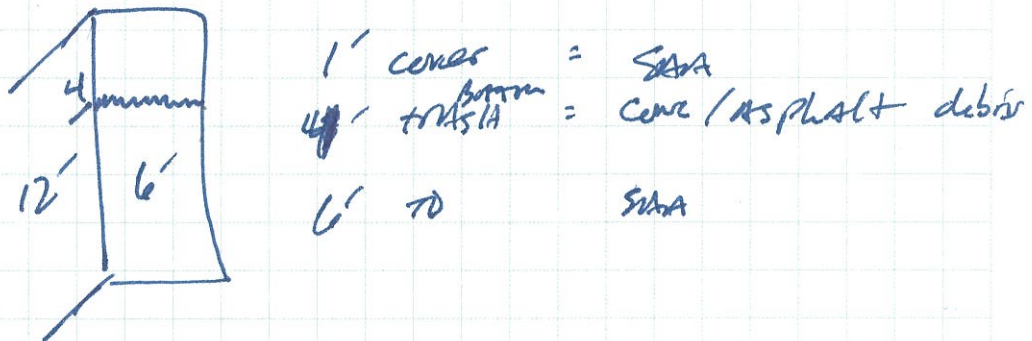




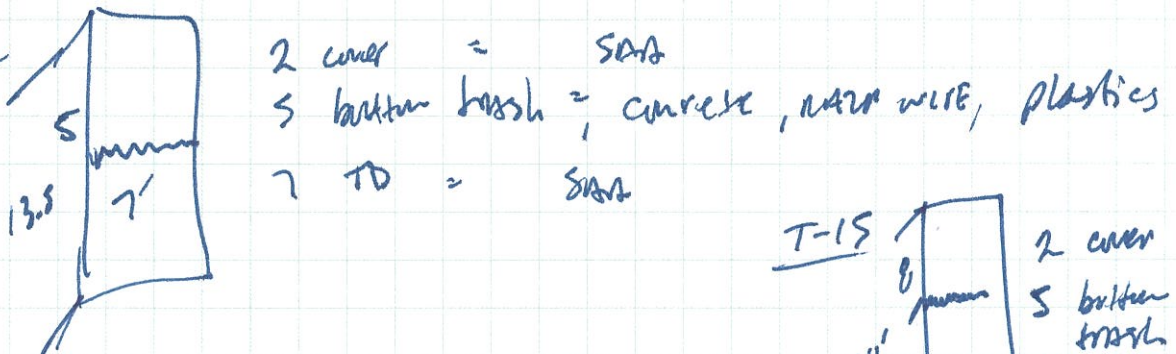
T-12



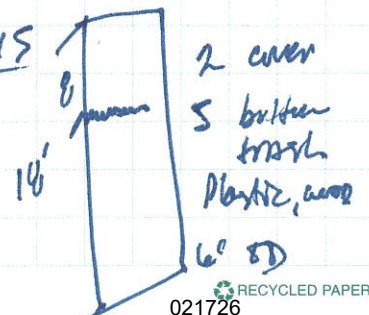
T-13



T-14



T-15



QA-1 = SB-8  
2 = SB-4  
3 = SB-1

All - metals  
All - metals  
All - metals, pest, herb, suve

# **Daily Quality Control Reports**

## DAILY QUALITY CONTROL REPORT

USACE CONTRACT NUMBER: W912BV-04-D-2008 Task Order #007

MPI PROJECT NUMBER 5285-027

SITE LOCATION: Oro Grande Landfill (FTBL-14) Fort Bliss, New Mexico

Date: 2/12/08 Weather: Sunny mid 60's

MPI staff on location: Colin Nelson, Joe Arzaldana,  
Scott Walker

Subcontract companies and staff on location: Cott's Land Surveying;  
D & H Pump - Sergio Papan; Enviro Drill - Mike Stone, Karlell Saen;

Other site visitors: Robert L. Lohr DDE.

Work activities completed (including sample ID#, and samples shipped):

Cott's - Surveyed outer Perimeter of Landfill  
D & H pump - Started trench excavation } Joe A.  
Enviro Drill completed SB-7, SB-8 and began } Colin M.  
SB-6. approx. 50 ft drilled.  
Scott Walker of MPI conducted Ecological Survey  
UXO training Proceeded alsover. UXO at 8:15 am at  
McGregor Base Camp. w/all Subs present.

Issues encountered and corrective actions taken: ~~SB-6~~

Samples collected - F14-SB-7 (0-1), F14-SB-8 (0-1), QA/QC From  
F14-SB-8 (0-1), F14-SB-6 (0-2), F14-SB-6 (15-15'), F14-SB-6 (28-30)

Work activities expected to begin tomorrow: Finish SB-6 to 115 ft or 5 ft clay layer  
+ Trenching

IDW generated: 3 Drawings

Preparer's Signature: Colin Nelson

## DAILY QUALITY CONTROL REPORT

USACE CONTRACT NUMBER: W912BV-04-D-2008 Task Order #007

MPI PROJECT NUMBER 5285-027

SITE LOCATION: Oro Grande Landfill (FTBL-14) Fort Bliss, New Mexico

Date: 2/13/08 Weather: Mid 60's Sunny Varying Winds

MPI staff on location: Colin Nelson & Joe Arzate

Subcontract companies and staff on location: D & H Pump - Sergio Pagan  
Enviro-Drill - Mike Stone & Kordell ~~Saenz~~ Saenz

Other site visitors: \_\_\_\_\_

Work activities completed (including sample ID#, and samples shipped):

D & H Pump continued trenching activities w/ Joe A. of MPR  
Enviro-Drill completed SB-6, Proceeded onto SB-4  
and SB-1. (Vertical Borings)

Samples collected = F14-SB-6 (113-115), Gratch at 115-116.5 ft,  
F14-SB-4 (0-2), F14-SB-4 (13-15), F14-SB-4 (28-30)  
AA & Dup 2 at SB-4 (28-30), F14-SB-1 (0-2), F14-SB-1 (13-15)  
F14-SB-1 (28-30)

Issues encountered and corrective actions taken: \_\_\_\_\_

Work activities expected to begin tomorrow: Direction Borings

IDW generated: \_\_\_\_\_

Preparer's Signature: Colin Nelson



## DAILY QUALITY CONTROL REPORT

USACE CONTRACT NUMBER: W912BV-04-D-2008 Task Order #007

MPI PROJECT NUMBER 5285-027

SITE LOCATION: Oro Grande Landfill (FTBL-14) Fort Bliss, New Mexico

Date: 2/14/08 Weather: Sunny - Mid 60's windy

MPI staff on location: Colin Nelson + Joe Arzobuena

Subcontract companies and staff on location: \_\_\_\_\_

Enviro Drill - Mike Stone + Cordell Saez

Other site visitors: \_\_\_\_\_

Work activities completed (including sample ID#, and samples shipped):

Directional Boring SB-3. Driller set rig to 30°  
off ground surface - had to reset rig to 30° off vertical.

3:50 pm - Rig shifted - spent rest of day trying  
to Reset Rig.

Joe delivered Samples to FedEx

Samples Collected - IDW-comp, FI4-SB-3(0-2),  
FI4-SB-3(13-15),

Issues encountered and corrective actions taken: \_\_\_\_\_

Work activities expected to begin tomorrow: Finish SB-3 start remaining directional  
borings

IDW generated: \_\_\_\_\_

Preparer's Signature: Colin Nelson

## DAILY QUALITY CONTROL REPORT

USACE CONTRACT NUMBER: W912BV-04-D-2008 Task Order #007

MPI PROJECT NUMBER 5285-027

SITE LOCATION: Oro Grande Landfill (FTBL-14) Fort Bliss, New Mexico

Date: 2/15/08 Weather: Sunny mid 60's

MPI staff on location: Glin Nelson - Joe Arzolden

Subcontract companies and staff on location: Enviro-Drill - Mike Stone  
Kardell Saez, Cutts Land Surveying - arrived to finish survey

Other site visitors: \_\_\_\_\_

Work activities completed (including sample ID#, and samples shipped):

Finished SB-3, SB-5, + SB-2  
At 15 ft on SB-5 rig hit boulder - shifted rig. Moved Rig  
Laterally 5 ft to south 1st attempt. Finished SB-2 at  
7:00 PM.

Samples collected = ~~SB~~ F14-SB-3(28-30), F14-SB-5(0-2)  
F14-SB-5(13-15), F14-SB-5(28-30), F14-SB-2(0-2)  
F14-SB-2(13-15), F14-SB-2(28-30); 2 in site samples.

Issues encountered and corrective actions taken: \_\_\_\_\_

Work activities expected to begin tomorrow: \_\_\_\_\_

IDW generated: \_\_\_\_\_

Preparer's Signature: 

## DAILY QUALITY CONTROL REPORT

USACE CONTRACT NUMBER: W912BV-04-D-2008 Task Order #007

MPI PROJECT NUMBER 5285-027

SITE LOCATION: Oro Grande Landfill (FTBL-14) Fort Bliss, New Mexico

Date: 2/16/08 Weather: 40's C/L

MPI staff on location: Colin Nelson

Subcontract companies and staff on location: Enviro-Drill  
Mike Stone & Kordell Saenz

Other site visitors: \_\_\_\_\_

Work activities completed (including sample ID#, and samples shipped):

Polled augers from SB-2 and started  
grouting Borings. Departed site at 9:45.  
Packed Sample Solers & shipped via FedEx.

Issues encountered and corrective actions taken: \_\_\_\_\_

Work activities expected to begin tomorrow: \_\_\_\_\_

IDW generated: \_\_\_\_\_

Preparer's Signature: Colin Nelson

# **Chain of Custody Documents**



☐ e-Lab Analytical, Inc.  
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Houston, Texas 77099  
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(Fax) 281.530.5887

## Chain of Custody Form

☐ e-Lab Analytical, Inc.  
3352 128th Avenue  
Holland, Michigan 49424  
(Tel) 616.399.6070  
(Fax) 616.399.6185



Page 1 of 1

Customer Information				Project Information				Project Manager:				Work Order #:					
Project Name				Oro Grande LF-Shallow Borings				Parameter/Method Request for Analysis				VOC (5035/6260) Select					
Project Number				5285-027				A				B					
Bill To Company				Malcolm Pirnie, Inc.				C				DRO					
Invoice Attn				Michael Fortenza				D				SVOC (8270) Select					
Address				1700 West Loop South				E				Total Metals (6020/7000) Select					
Suite 1450				Suite 1450				F				Pesticides, Chlorinated (8081)					
City/State/Zip				Houston, TX 77027				G				PCBs (8082)					
Phone				(713) 840-1511				H				Herbicides (8151)					
Fax				(713) 840-1207				I				Total Cyanide (9012)					
e-Mail Address								J				Phosphorus					
												Moisture					
No.	Sample Description	Date	Time	Matrix	Pres.	# Bottles	A	B	C	D	E	F	G	H	I	J	Hold
1	SB-14-SB-1 (13-20)	2/13/06	4:25	Soil		2 BTL	X	X						X			
2	SB-14-SB-1 (13-15)		4:45			1 BTL	X	X						X			
3	SB-14-SB-1 (13-15)		5:15			1 BTL	X	X						X			
4	SB-14-SB-4 (10-2)		3:28			2 BTL	X	X						X			
5	SB-14-SB-4 (13-15)		3:32			2 BTL	X	X						X			
6	SB-14-SB-4 (13-30)		3:55			2 BTL	X	X						X			
7	DUP-2					1 BTL	X	X						X			
8	DUP-3					2 BTL	X	X						X			
9																	
10																	

Shipment Method				Required Turnaround Time: (Check Box)				Results Due Date:			
				<input checked="" type="checkbox"/> 5 WK Days <input type="checkbox"/> 10 WK Days <input type="checkbox"/> 24 Hour							
Relinquished by: Col. Nulga				Received by: (Laboratory):				QC Package: (Check One Box Below)			
Relinquished by:				Received by:				<input type="checkbox"/> Level II Std QC <input type="checkbox"/> TRRP Checklist			
Logged by (Laboratory):				Checked by (Laboratory):				<input type="checkbox"/> Level III Std QC/Raw Data <input type="checkbox"/> TRRP Level IV			
Preservative Key: 1-HCl 2-HNO <sub>3</sub> 3-H <sub>2</sub> SO <sub>4</sub> 4-NaOH 5-Na <sub>2</sub> S <sub>2</sub> O <sub>3</sub> 6-NaHSO <sub>4</sub> 7-Other 8-4°C 9-5035				Notes: 10 Day TAT. USACE-Level III Report.				<input checked="" type="checkbox"/> Level IV SW646/CLP <input type="checkbox"/> Other			

Note: 1. Any changes must be made in writing once samples and COC Form have been submitted to e-Lab Analytical, Inc.  
2. Unless otherwise agreed in a formal contract, services provided by e-Lab Analytical, Inc. are expressly limited to the terms and conditions stated on the reverse.

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Customer Information				Project Information				Project Manager:				Work Order #:																	
Customer Information				Project Information				Parameter/Method Request for Analysis																					
Purchase Order	Work Order	Company Name	Send Report To	Project Name	Project Number	Bill To Company	Invoice Attn	Q/O Grande LF-Deep Borings	5285-027	A	VOC (5035/8260) Select	B	SVOC (8270) Select	C	Total Metals (6020/7000) Select	D	PCBs (8082)	E	Pesticides, Chlorinated (8081)	F	Herbicides (8151)	G	DRO	H	Total Cyanide (9012)	I	Phosphorus	J	Moisture
		Malcolm Pirnie	Michael Forlenza																										
		1700 West Loop South		Address																									
		Suite 1450																											
		Houston, TX 77027		City/State/Zip																									
		(713) 840-1511		Phone																									
		(713) 840-1207		Fax																									
				e-Mail Address																									
No.	Sample Description	Date	Time	Matrix	Pres.	# Bottles	A	B	C	D	E	F	G	H	I	J	Hold												
1	F14-SB-6 (10-2)	2/13/08	11:15	Soil		2																							
2	F14-SB-6 (13-15)	2/13/08	11:15	Soil		2																							
3	F14-SB-6 (10-20)	2/13/08	11:15	Soil		2																							
4	F14-SB-6 (113-115)	2/13/08	11:15	Soil		2																							
5																													
6																													
7																													
8																													
9																													
10																													
Sampler(s) Please Print & Sign				Shipment Method				Required Turnaround Time: (Check Box)				Results Due Date:																	
								<input checked="" type="checkbox"/> Std 10 WK Days <input type="checkbox"/> 6 WK Days <input type="checkbox"/> 24 Hour																					
Relinquished by:				Received by:				Notes:				10 Day TAT, USACE-Level III Report.																	
Relinquished by:				Received by (Laboratory):				Cooler ID				Cooler Temp.																	
Logged by (Laboratory):				Checked by (Laboratory):				Cooler ID				Cooler Temp.																	
Preservative Key: 1-HCl 2-HNO <sub>3</sub> 3-H <sub>2</sub> SO <sub>4</sub> 4-NaOH 5-Na <sub>2</sub> S <sub>2</sub> O <sub>3</sub> 6-NaHSO <sub>4</sub> 7-Other 8-4°C 9-5035								QC Package: (Check One Box Below)				TRSP Checklist																	
								<input type="checkbox"/> Level II Std QC <input type="checkbox"/> Level III Std QC/Raw Data <input type="checkbox"/> Level IV SW846/CLP <input checked="" type="checkbox"/> Other				<input type="checkbox"/> TRSP Level I <input type="checkbox"/> TRSP Level II <input type="checkbox"/> TRSP Level III <input type="checkbox"/> TRSP Level IV																	



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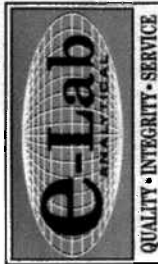


Page      of     

Customer Information				Project Information				Project Manager:				Parameter/Method Request for Analysis				Work Order #:			
Purchase Order		Project Name		Oro Grande LF-Former Tar Area		A		VOC (5035/8280) Select		5011/154		B		SVOC (8270) Select					
Work Order		Project Number		5285-027		B						C		Total Metals (8020/7000) Select					
Company Name		Bill To Company		Malcolm Pirnie, Inc.		C						D		PCBs (8082)					
Send Report To		Invoice Attn		Michael Forlenza		D						E		Pesticides, Chlorinated (8081)					
Address		Address		1700 West Loop South		E						F		Herbicides (8151)					
City/State/Zip		City/State/Zip		Houston, TX 77027		F						G		DRO					
Phone		Phone		(713) 840-1511		G						H		Total Cyanide (8012)					
Fax		Fax		(713) 840-1207		H						I		Phosphorus					
e-Mail Address		e-Mail Address				I						J		Moisture					
No.	Sample Description	Date	Time	Matrix	Pres.	# Bottles	A	B	C	D	E	F	G	H	I	J	Hold		
1	814-SB-7 (0-1)	2/12/08		Soil		3 Btl	X			X	X	X	X	X	X	X			
2	814-SB-8 (0-1)	2/12/08		Soil		4 Btl	X			X	X	X	X	X	X	X			
3	Dup-1	2/12/08		Soil		3 Btl	X			X	X	X	X	X	X	X			
4																			
5																			
6																			
7																			
8																			
9																			
10																			

Shipment Method				Required Turnaround Time: (Check Box)				Results Due Date:					
				<input checked="" type="checkbox"/> Std 10 WK Days <input type="checkbox"/> 5 WK Days <input type="checkbox"/> 2 WK Days <input type="checkbox"/> 24 Hour									
				Notes: 10 Day TAT, USACE-Level III Report.									
Relinquished by:				Date:	Time:	Received by:				Cooler ID	Cooler Temp.	QC Package: (Check One Box Below)	
Relinquished by:				Date:	Time:	Received by (Laboratory):						<input type="checkbox"/> Level II Std QC <input type="checkbox"/> TRRP Checklist	
Logged by (Laboratory):				Date:	Time:	Checked by (Laboratory):						<input type="checkbox"/> Level III Std QC/Raw Data <input type="checkbox"/> TRRP Level IV	
Preservative Key: 1-HCl 2-HNO <sub>3</sub> 3-H <sub>2</sub> SO <sub>4</sub> 4-NaOH 5-Na <sub>2</sub> S <sub>2</sub> O <sub>3</sub> 6-NaHSO <sub>4</sub> 7-Other 8-4°C 9-5035												<input type="checkbox"/> Level IV SW/MS/CLP <input checked="" type="checkbox"/> Other	





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Page      of     

Customer Information				Project Information				Project Manager:				Work Order #:					
Customer Information				Project Information				Parameter/Method Request for Analysis									
Purchase Order				Project Name				A				VOC (5035/8260), Select					
Work Order				Project Number				B				DRO					
Company Name				Bill To Company				C				SVOC (8270) Select					
Send Report To				Invoice Attn				D				Total Metals (8020/7000) Select					
Address				Address				E				Pesticides, Chlorinated (8081)					
City/State/Zip				City/State/Zip				F				PCBs (8082)					
Phone				Phone				G				Herbicides (8151)					
Fax				Fax				H				Total Cyanide (9012)					
e-Mail Address				e-Mail Address				I				Phosphorus					
								J				Moisture					
No.	Sample Description	Date	Time	Matrix	Pres.	# Bottles	A	B	C	D	E	F	G	H	I	J	Hold
1	RINSE-1	2-14-08	0830	H <sub>2</sub> O	VARIOUS	17	X	X	X	X	X	X	X				
2	RINSE-2	2-14-08	0900	H <sub>2</sub> O	VARIOUS	17	X	X	X	X	X	X	X				
3																	
4																	
5																	
6																	
7																	
8																	
9																	
10																	

Sampler(s) Please Print & Sign		Shipment Method		Required Turnaround Time: (Check Box)		Results Due Date:	
ANALYST: [Signature]		FEDEX		<input checked="" type="checkbox"/> Std 10 WK Days <input type="checkbox"/> 5 WK Days <input type="checkbox"/> 2 WK Days <input type="checkbox"/> 24 Hour		10 Day TAT: USACE-Level III Report	
Relinquished by:	Date: 2-14-08	Time: 1500	Received by:				
Relinquished by:	Date:	Time:	Received by (Laboratory):				
Logged by (Laboratory):	Date:	Time:	Checked by (Laboratory):				
Preservative Key: 1-HCl 2-HNO <sub>3</sub> 3-H <sub>2</sub> SO <sub>4</sub> 4-NaOH 5-Na <sub>2</sub> S <sub>2</sub> O <sub>3</sub> 6-NaHSO <sub>4</sub> 7-Other 8-4°C 9-5035		Cooler ID		Cooler Temp.	OC Package: (Check One Box Below)		
					<input type="checkbox"/> Level II Std OC <input type="checkbox"/> TRRP Check List		
					<input type="checkbox"/> Level III Std OC/Raw Data <input type="checkbox"/> TRRP Level IV		
					<input type="checkbox"/> Level IV SW846/CLP <input checked="" type="checkbox"/> Other		

11/30/2018

021738

Note: 1. Any changes must be made in writing once samples and COC Form have been submitted to e-Lab Analytical, Inc.

2. Unless otherwise agreed in a formal contract, services provided by e-Lab Analytical, Inc. are expressly limited to the terms and conditions stated on the reverse.

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# **Surveyor's Report**



**Cutts Land Surveying, Inc.**  
Professional Land Surveyors

March 13, 2008

Malcolm Pirnie  
1700 West Loop South  
Suite 1450  
Houston, Texas 77027

Attn: Michael Timmer

Re: Oro Grande Landfill

Dear Michael:

Listed below are the coordinates and elevations for the bore holes at the Oro Grande Landfill, Fort Bliss, New Mexico.

Borehole	North	East	Elevation
SB1	11,760,150.24	1,286,296.30	4208.68
SB2	11,760,107.11	1,286,330.11	4207.95
SB3	11,759,920.75	1,286,342.10	4202.62
SB4	11,759,799.12	1,286,327.45	4198.67
SB5	11,760,030.67	1,286,283.06	4203.50
SB6	11,759,794.50	1,286,284.56	4198.57
SB7	11,760,011.69	1,286,031.53	4201.78
SB8	11,759,838.51	1,286,092.46	4196.88

If you have any questions or need additional information, please call.

Thanks,

Jerry Cutts

## **Appendix C: Analytical Reports**

- **Geotechnical Results**
- **Analytical Results**



U.S. Army Corps of Engineers  
RCRA Facility Investigation Report  
Oro Grande Landfill (SWMU-25/FTBL-14)



**C**



Client: Malcolm Pirnie Inc  
104 Corporate Park Dr  
White Plains, NY 10604-

RECEIVED MAR 0 8 2008

Report Date: February 27, 2008

Attn: Michael Forlenza  
Project Name: Geotech Testing for Oro Grande Landfill  
Oro Grande  
Oro Grande, NM

Project #: 8719-000012  
Work Order #: 1  
Lab #: 80069  
Sampled By: Client  
Date Sampled: 02/14/2008  
Visual Description of  
Material:  
Sample Source: F14-SB-7, (1'-3')

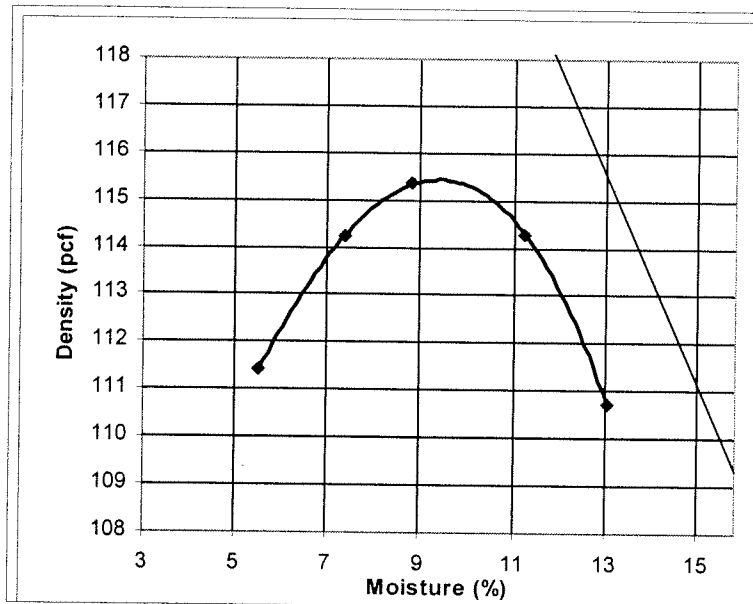
Project Manager: David Varela

SOILS / AGGREGATES

Sieve Analysis (ASTM C117/C136)

Specifications

<u>Sieve Size</u>	<u>Passing</u>	<u>Min</u>	<u>Max</u>
1/2in.	100%		
3/8in.	100%		
#4	99%		
#10	98%		
#40	95%		
#100	24%		
#200	9.6%		




Moisture Density Relationship: (ASTM D1557) Method: A  
Preparation Method: Dry Rammer Type: Mechanical  
Specific Gravity: 2.451 Assumed  
Maximum Density: 115.5  
Optimum Moisture: 9.5

Plasticity Index (ASTM D4318)

Liquid Limit: NV  
Plastic Limit: NV  
Plasticity Index: NP

Preparation Method: Dry Liquid Limit Method: A

Soil Classification (ASTM D2487) SP-SM

Reviewed By:   
LC

Distribution: Client: ☒ File: ☒ Supplier: ☒ Other: Addressee (2)

AMEC Earth Environmental, Inc.  
125 Montoya Rd  
El Paso, TX 79932  
Tel 9155852472  
Fax 9155852626

www.amec.com



Client: Malcolm Pirnie Inc  
104 Corporate Park Dr  
White Plains, NY 10604-

Report Date: February 27, 2008

Project #: 8719-000012

Work Order #: 1

Lab #: 80067

Sampled By: Client

Date Sampled: 02/14/2008

Attn: Michael Forlenza  
Project Name: Geotech Testing for Oro Grande Landfill  
Oro Grande  
Oro Grande, NM

Visual Description of  
Material:

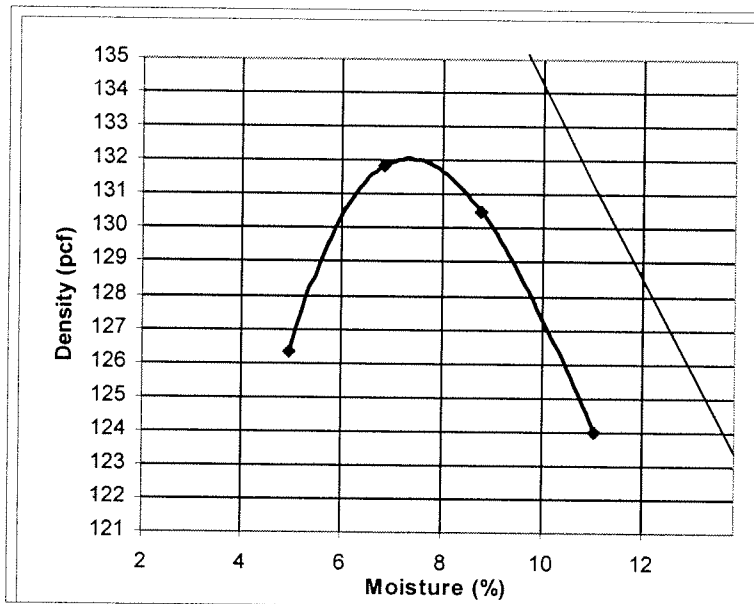
Sample Source: F14-SB-5, (1'-3')

Project Manager: David Varela

## SOILS / AGGREGATES

### Sieve Analysis (ASTM C117/C136)

Sieve Size	Passing	Specifications	
		Min	Max
1in.	100%		
3/4in.	99%		
1/2in.	95%		
3/8in.	93%		
#4	86%		
#10	77%		
#40	66%		
#100	35%		
#200	17%		



### Moisture Density Relationship: (ASTM D1557) Method: A

Preparation Method: Dry Rammer Type: Mechanical

Specific Gravity: 2.751 Assumed

Maximum Density: 132.0

Optimum Moisture: 7.5

### Plasticity Index (ASTM D4318)

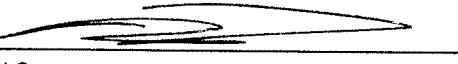
Liquid Limit: NV

Plastic Limit: NV

Plasticity Index: NP

Preparation Method: Dry Liquid Limit Method: A

Soil Classification (ASTM D2487) SM

Reviewed By:   
LC

**Distribution:** Client: ☒ File: ☒ Supplier: ☒ Other: Addressee (2)

AMEC Earth Environmental, Inc.  
125 Montoya Rd  
El Paso, TX 79932  
Tel 9155852472  
Fax 9155852626

www.amec.com



**Client:** Malcolm Pirnie Inc  
104 Corporate Park Dr  
White Plains, NY 10604-

**Report Date:** February 27, 2008

**Attn:** Michael Forlenza  
**Project Name:** Geotech Testing for Oro Grande Landfill  
Oro Grande  
Oro Grande, NM

**Project #:** 8719-000012

**Work Order #:** 1

**Lab #:** 80065

**Sampled By:** Client

**Date Sampled:** 02/14/2008

**Visual Description of Material:**

**Sample Source:** F14-SB-3, (1'-3')

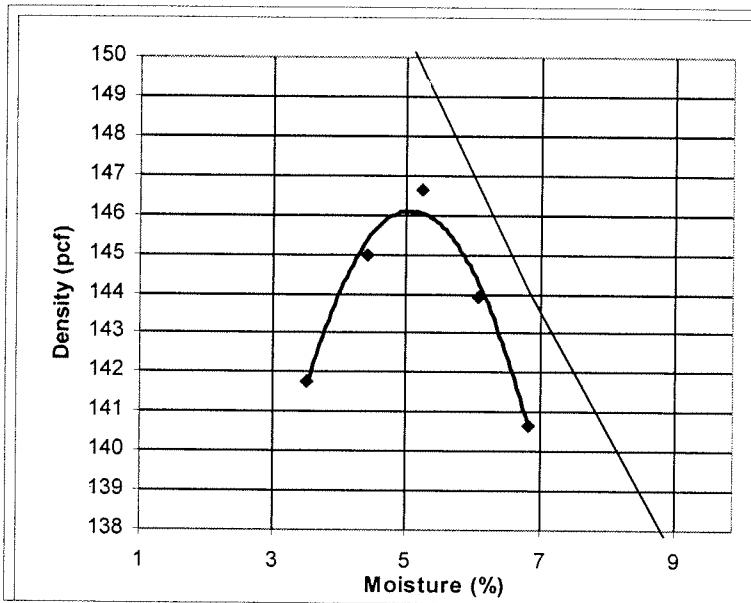
**Project Manager:** David Varela

# SOILS / AGGREGATES

## Sieve Analysis (ASTM C117/C136)

### Specifications

<u>Sieve Size</u>	<u>Passing</u>	<u>Min</u>	<u>Max</u>
3in.	100%		
2in.	97%		
1 1/2in.	90%		
1in.	80%		
3/4in.	74%		
1/2in.	66%		
3/8in.	61%		
#4	52%		
#10	41%		
#40	32%		
#100	22%		
#200	16%		



## Correction Soil Containing Oversize Particles (ASTM 4718)

**Moisture Density Relationship:** (ASTM D1557) Method: B

**Preparation Method:** Dry **Rammer Type:** Mechanical

**Specific Gravity:** 2.751 **Assumed** **Coarse Specific Gravity:** 2.65

**Maximum Density:** 146.0

**Optimum Moisture:** 5.0

## Plasticity Index (ASTM D4318)

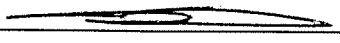
**Liquid Limit:** 30

**Plastic Limit:** 14

**Plasticity Index:** 16

**Preparation Method:** Dry **Liquid Limit Method:** A

**Soil Classification (ASTM D2487)** SC

**Reviewed By:**   
LC

**Distribution:** Client: ☒ File: ☒ Supplier: ☒ Other: Addressee (2)

AMEC Earth Environmental, Inc.  
125 Montoya Rd  
El Paso, TX 79932  
Tel 9155852472  
Fax 9155852626

www.amec.com





Client: Malcolm Pirnie Inc  
104 Corporate Park Dr  
White Plains, NY 10604-

Report Date: February 27, 2008

Attn: Michael Forlenza  
Project Name: Geotech Testing for Oro Grande Landfill  
Oro Grande  
Oro Grande, NM

Project #: 8719-000012

Work Order #: 1

Lab #: 80064

Sampled By: Client

Date Sampled: 2/14/2008

Visual Description of  
Material:

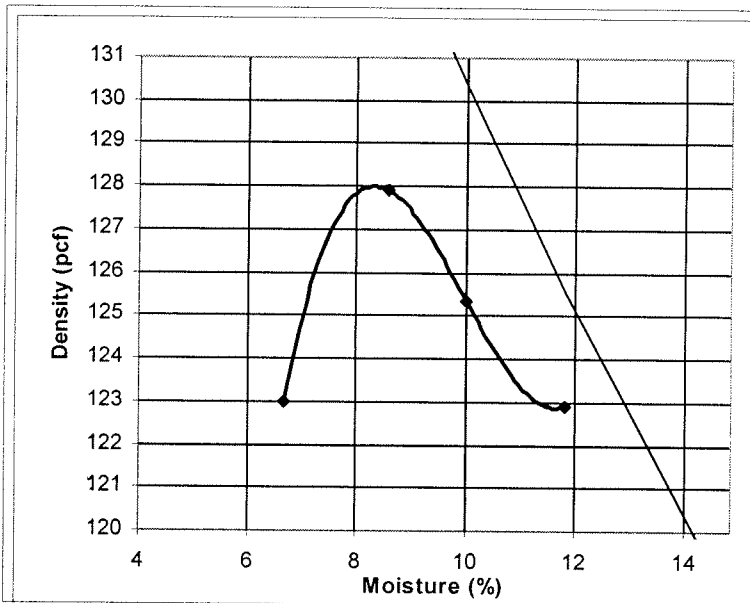
Sample Source: F14-SB-2, (1'-3')

Project Manager: David Varela

## SOILS / AGGREGATES

### Sieve Analysis (ASTM C117/C136)

Sieve Size	Passing	Specifications	
		Min	Max
1 1/2in.	100%		
1in.	97%		
3/4in.	96%		
1/2in.	89%		
3/8in.	82%		
#4	64%		
#10	48%		
#40	39%		
#100	28%		
#200	18%		



### Moisture Density Relationship: (ASTM D1557) Method: C

Preparation Method: Dry Rammer Type: Mechanical

Specific Gravity: 2.651 Assumed

Maximum Density: 128.0

Optimum Moisture: 8.5

### Plasticity Index (ASTM D4318)

Liquid Limit: NV

Plastic Limit: NV

Plasticity Index: NP

Preparation Method: Dry Liquid Limit Method: A

Soil Classification (ASTM D2487) SM

Reviewed By:

LC

*J. S. Zellmer*

**Distribution:** Client: ☒ File: ☒ Supplier: ☒ Other: Addressee (2)

AMEC Earth Environmental, Inc.  
125 Montoya Rd  
El Paso, TX 79932  
Tel 9155852472  
Fax 9155852626

www.amec.com



**Client:** Malcolm Pirnie Inc  
104 Corporate Park Dr  
White Plains, NY 10604-

**Report Date:** February 27, 2008

**Attn:** Michael Forlenza  
**Project Name:** Geotech Testing for Oro Grande Landfill  
Oro Grande  
Oro Grande, NM

**Project #:** 8719-000012

**Work Order #:** 1

**Lab #:** 80063

**Sampled By:** Client

**Date Sampled:** 2/14/2008

**Visual Description of Material:**

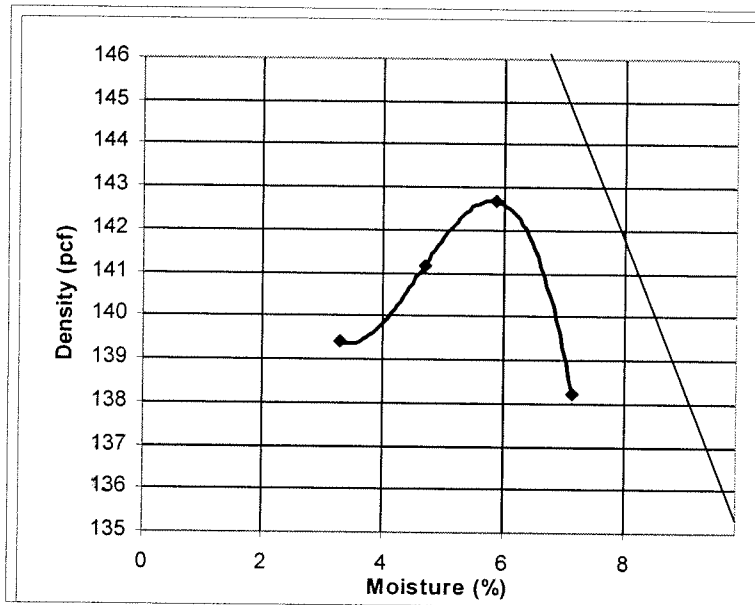
**Sample Source:** F14-SB-1, (1'-3')

**Project Manager:** David Varela

# SOILS / AGGREGATES

## Sieve Analysis (ASTM C117/C136)

Sieve Size	Passing	Specifications	
		Min	Max
2in.	100%		
1 1/2in.	93%		
1in.	92%		
3/4in.	90%		
1/2in.	82%		
3/8in.	78%		
#4	67%		
#10	53%		
#40	41%		
#100	22%		
#200	12%		



## Correction Soil Containing Oversize Particles (ASTM 4718)

**Moisture Density Relationship:** (ASTM D1557) Method: B

**Preparation Method:** Dry **Rammer Type:** Mechanical

**Specific Gravity:** 2.791 **Assumed** **Coarse Specific Gravity:** 2.647

**Maximum Density:** 142.5

**Optimum Moisture:** 6.0

## Plasticity Index (ASTM D4318)

**Liquid Limit:** 23

**Plastic Limit:** 18

**Plasticity Index:** 5

**Preparation Method:** Dry **Liquid Limit Method:** A

**Soil Classification (ASTM D2487)** SP-SC

**Reviewed By:**

*J. J. Zellmer*  
LC

**Distribution:** Client: ☒ File: ☒ Supplier: ☒ Other: Addressee (2)

AMEC Earth Environmental, Inc.  
125 Montoya Rd  
El Paso, TX 79932  
Tel 9155852472  
Fax 9155852626

www.amec.com



Client: Malcolm Pirnie Inc  
104 Corporate Park Dr  
White Plains, NY 10604-

Report Date: February 27, 2008

Attn: Michael Forlenza  
Project Name: Geotech Testing for Oro Grande Landfill  
Oro Grande  
Oro Grande, NM

Project #: 8719-000012

Work Order #: 1

Lab #: 80066

Sampled By: Client

Date Sampled: 2/14/2008

Visual Description of  
Material:

Sample Source: F14-SB-4, (1'-3')

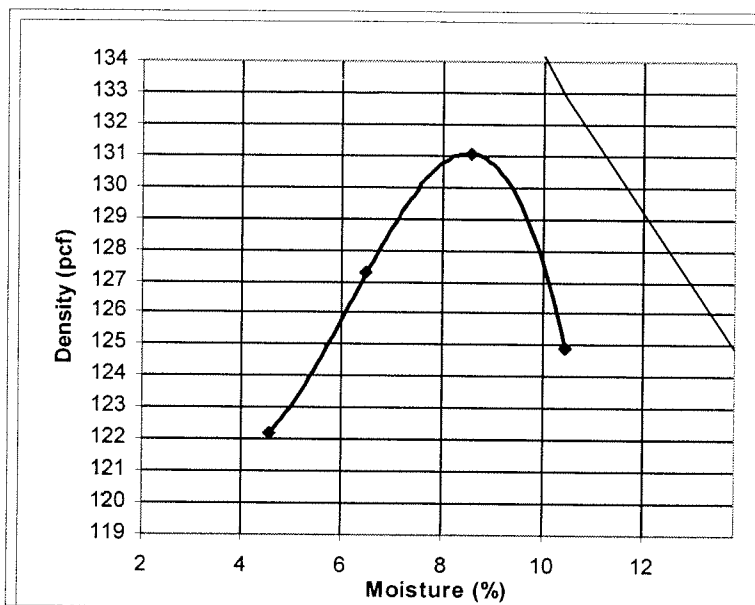
Project Manager: David Varela

## SOILS / AGGREGATES

### Sieve Analysis (ASTM C117/C136)

#### Specifications

Sieve Size	Passing	Min	Max
1in.	100%		
3/4in.	99%		
1/2in.	97%		
3/8in.	96%		
#4	91%		
#10	81%		
#40	68%		
#100	38%		
#200	20%		



### Moisture Density Relationship: (ASTM D1557) Method: A

Preparation Method: Dry Rammer Type: Mechanical

Specific Gravity: 2.751 Assumed

Maximum Density: 131.0

Optimum Moisture: 8.5

### Plasticity Index (ASTM D4318)

Liquid Limit: 22

Plastic Limit: 13

Plasticity Index: 9

Preparation Method: Dry Liquid Limit Method: A

Soil Classification (ASTM D2487) SC

Reviewed By:

*J. J. Zellmer*

**Distribution:** Client: ☒ File: ☒ Supplier: ☒ Other: Addressee (2)

AMEC Earth Environmental, Inc.  
125 Montoya Rd  
El Paso, TX 79932  
Tel 9155852472  
Fax 9155852626

www.amec.com



**Client:** Malcolm Pirnie Inc.  
104 Corporate Park Dr.  
White Plain, NY 10643-804

**Report Date:** March 10, 2008

**Attn:** Micheal Florenza  
**Project Name:** Geotech Testing Oro Grande Landfill  
El Paso, TX

**Project #:** 8-719-000012

**Work Order #:** 1

**Lab #:** 8-0205

**Sampled By:** Client

**Date Sampled:**

**Visual Description of Tube Sample Material:**

**Sample Source:** F14-SB-6 115-116.5

**Project Manager:** Robert Romero

**SOILS / AGGREGATES**

**Sieve Analysis (ASTM C117-04/C136-06)**

**200 Wash Procedure:** A

<u>Sieve Size</u>	<u>Passing</u>
3/8in.	100%
#4	99%
#8	99%
#10	99%
#16	98%
#30	97%
#40	96%
#50	96%
#100	92%
#200	66%

**Plasticity Index (ASTM D4318-05)**

**Preparation Method:** Dry

**Liquid Limit:** 24

**Liquid Limit Method:** A

**Plastic Limit:** 16

**Soil Classification (ASTM D2487-06)** CL

**Plasticity Index:** 8

**PI Sample Was Air Dried.**

**Reviewed By:** \_\_\_\_\_  
Jr

**Distribution:** Client: ☒ File: ☒ Supplier: ☒ Other: Addressee (2)  
Email: ☐

AMEC Earth Environmental, Inc.  
8519 Jefferson NE  
Albuquerque, NM 87113  
Tel 5058211801  
Fax 5058217371

www.amec.com



PROJECT: Geotech Testing Oso Grande Landfill  
CLIENT: Malcolm Pirnie, Inc.  
MATERIAL: Tube Sample  
SAMPLE SOURCE F14 SB-6 115-116.5 ft  
PREPARATION: In Situ

JOB NO: 8-719-000012

LAB NO: 8-0205

DATE SAMPLED:

SAMPLED BY: Client

REVIEWED BY: *[Signature]*

### Measurement of Hydraulic Conductivity (Applicable Portions of ASTM D5856)

Lab Number	Sample Name	Method	$K_{sat}$ (cm/s)*	$K_{sat}$ (ft/day)*	Initial Moisture Content ** (%)	Saturated Moisture Content ** (%)	Dry Bulk Density (lb/ft <sup>3</sup> )
8-0205	F14 SB-6 15-16.5	Constant Head	1.05E-04	2.98E-01	9.7%	35.5%	82.4

\*Corrected to 20 °C

\*\*Gravimetric Moisture (percent by mass)

AMEC Earth Environmental, Inc.  
8519 Jefferson NW  
Albuquerque, NM 87113  
Phone: (505) 821-1801  
Fax: (505) 821-7371  
[www.amec.com](http://www.amec.com)





PROJECT: Geotech Testing, Oro Grande Landfill  
CLIENT: Malcolm Pirnie, Inc  
MATERIAL: Silty Sand w/Gravel  
SAMPLE SOURCE: F-14 SB-2 1-3 ft

JOB NO: 8-719-000012  
LAB NO: 8-0229-01  
DATE SAMPLED:  
SAMPLED BY: Client

---

Measurement of Hydraulic Conductivity of Saturated Porous Materials Using a Flexible Wall Permeameter (ASTM D5084)

---

SAMPLE PREPARATION: Remolded at ~95% Proctor  
near optimum moisture  
METHOD OF COMPACTION: Remolded in 6 lifts

TESTING METHOD: Method C: Falling Head Rising Tailwater

FIELD MOISTURE:	NA	LAB MOISTURE:	NA
INITIAL DIAMETER (cm):	7.28	FINAL DIAMETER	7.30
INITIAL LENGTH (cm):	7.56	FINAL LENGTH	7.61
INITIAL MOISTURE			
CONTENT (%):	8.4	FINAL MOISTURE CONTENT (%):	15.0

CONSOLIDATED? (Y/N):	N		
CELL PRESSURE (psi):	NA	POST CONSOLIDATION DIAMETER (cm):	NA
BACKPRESSURE (psi):	NA	POST CONSOLIDATION LENGTH (cm):	NA

INITIAL DRY BULK DENSITY (lb/ft<sup>3</sup>): 119.6  
% OF D1557 COMPACTION: 93.4  
FINAL DRY BULK DENSITY (lb/ft<sup>3</sup>): 118.5

FINAL B PARAMETER READING: 1.00      FINAL BACKPRESSURE (psi): 85

AVERAGE  $K_{sat}$  \* (cm/s): 1.69E-04      AVERAGE  $K_{sat}$  \* (ft/day): 4.80E-01

MAXIMUM GRADIENT USED: 1.91  
MINIMUM GRADIENT USED: 1.70

\*Corrected to 20 °C

\*\*N.B.: All final sample dimensions are subject to sample deformation caused by exsolution of air in pore water and handling during removal from cell.



PROJECT: Geotech Testing, Oro Grande Landfill  
CLIENT: Malcolm Pirnie, Inc  
MATERIAL: Silty Sand w/Gravel  
SAMPLE SOURCE: F-14 SB-5 1-3 ft

JOB NO: 8-719-000012  
LAB NO: 8-0229-02  
DATE SAMPLED:  
SAMPLED BY: Client

---

Measurement of Hydraulic Conductivity of Saturated Porous Materials Using a Flexible Wall Permeameter (ASTM D5084)

---

SAMPLE PREPARATION: Remolded at ~95% Proctor  
near optimum moisture  
METHOD OF COMPACTION: Remolded in 6 lifts

TESTING METHOD: Method C: Falling Head Rising Tailwater

FIELD MOISTURE:	NA	LAB MOISTURE:	NA
INITIAL DIAMETER (cm):	7.28	FINAL DIAMETER	7.32
INITIAL LENGTH (cm):	7.56	FINAL LENGTH	7.58
INITIAL MOISTURE			
CONTENT (%):	7.2	FINAL MOISTURE CONTENT (%):	12.3

CONSOLIDATED? (Y/N):	N		
CELL PRESSURE (psi):	NA	POST CONSOLIDATION DIAMETER (cm):	NA
BACKPRESSURE (psi):	NA	POST CONSOLIDATION LENGTH (cm):	NA

INITIAL DRY BULK DENSITY (lb/ft<sup>3</sup>): 125.3  
% OF D1557 COMPACTION: 94.9  
FINAL DRY BULK DENSITY (lb/ft<sup>3</sup>): 123.8

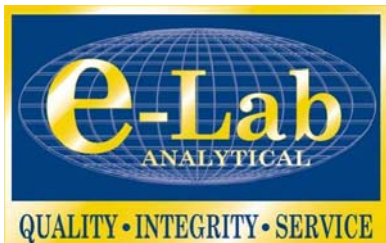
FINAL B PARAMETER READING: 0.96  
FINAL BACKPRESSURE (psi): 90

AVERAGE  $K_{sat}$  \* (cm/s): 1.60E-04  
AVERAGE  $K_{sat}$  \* (ft/day): 4.54E-01

MAXIMUM GRADIENT USED: 1.71  
MINIMUM GRADIENT USED: 1.50

\*Corrected to 20 °C

\*\*N.B.: All final sample dimensions are subject to sample deformation caused by exsolution of air in pore water and handling during removal from cell.



February 28, 2008

Michael Forlenza  
Malcolm Pirnie, Inc.  
1700 West Loop South  
Suite 1450  
Houston, TX 77027

Tel: (713) 840-1511  
Fax: (713) 840-1207

Re: Oro Grande LF- Former Tar Area

Work Order : **0802304**

Dear Michael Forlenza,

e-Lab Analytical, Inc. received 4 samples on 2/15/2008 09:15 AM for the analyses presented in the following report.

The analytical data provided relates directly to the samples received by e-Lab Analytical, Inc. and for only the analyses requested. Results are expressed as "as received" unless otherwise noted.

QC sample results for this data met EPA or laboratory specifications except as noted in the Case Narrative or as noted with qualifiers in the QC batch information. Should this laboratory report need to be reproduced, it should be reproduced in full unless written approval has been obtained by e-Lab Analytical, Inc. Samples will be disposed in 30 days unless storage arrangements are made.

The total number of pages in this report is 233.

If you have any questions regarding this report, please feel free to call me.

Sincerely,

Electronically approved by: Glenda H. Ramos

Ed B. Fry  
Project Manager



Certificate No: T104704231-06-TX

**e.Lab Analytical, Inc.**  
Part of the **ALS Laboratory Group**  
10450 Stancliff Rd, Suite 210 Houston, Texas 77099-4338  
Phone: (281) 530-5656 Fax: (281) 530-5887  
[www.elabi.com](http://www.elabi.com) [www.alsglobal.com](http://www.alsglobal.com)  
*A Campbell Brothers Limited Company*

---

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Former Tar Area  
**Work Order:** 0802304

**Work Order Sample Summary**

---

<u>Lab Samp ID</u>	<u>Client Sample ID</u>	<u>Matrix</u>	<u>Tag Number</u>	<u>Collection Date</u>	<u>Date Received</u>	<u>Hold</u>
0802304-01	F14-SB-7 (0-1)	Soil		2/12/2008	2/15/2008 09:15	<input type="checkbox"/>
0802304-02	F14-SB-8 (0-1)	Soil		2/12/2008	2/15/2008 09:15	<input type="checkbox"/>
0802304-03	Dup-1	Soil		2/12/2008	2/15/2008 09:15	<input type="checkbox"/>
0802304-04	Trip Blank	Water		2/12/2008	2/15/2008 09:15	<input type="checkbox"/>

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Former Tar Area  
**Work Order:** 0802304

**Case Narrative**

---

Batch 28371, Herbicides, MS/MSD are "P" qualified for MCPP due to coelution on the confirming column. Results are reported from the non-coeluting column.

Batch 28320, Metals, Sample 0802326-06 , F14-SB-2 (13-15) : MS/MSD recoveries were outside control limits for some compounds. MS/MSD RPDs were outside control limits for Barium and Strontium. The duplicate RPD was outside control limits for Barium. Results are flagged with "E" and "O" qualifiers as applicable.

Batch 28295, Semivolatile Organics, Sample 0802300-03 , F14-SB-1 (28-30) MS/MSD RPD was outside control limits for Pentachlorophenol. Individual recoveries were within control limits.

Batch R60110, Phosphorus, Sample 0802300-01, F14-SB-1 (0-2) : MS recovery was above control limits for Total Phosphorus.

Batch R60293, Silica, Sample 0802300-01, F14-SB-1 (0-2) : MS recovery was below control limits for Dissolved Silica.



# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Former Tar Area  
**Sample ID:** F14-SB-7 (0-1)  
**Collection Date:** 2/12/2008

**Work Order:** 0802304  
**Lab ID:** 0802304-01  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>MISCELLANEOUS PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
alpha-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
gamma-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
<b>ORGANOCHLORINE PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
4,4'-DDD	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDE	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDT	U		0.23	3.3	µg/Kg	1	2/24/2008
Aldrin	U		0.20	1.7	µg/Kg	1	2/24/2008
alpha-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
beta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Chlordane	U		3.0	17	µg/Kg	1	2/24/2008
delta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Dieldrin	U		0.20	3.3	µg/Kg	1	2/24/2008
Endosulfan I	U		0.20	1.7	µg/Kg	1	2/24/2008
Endosulfan II	U		0.30	3.3	µg/Kg	1	2/24/2008
Endosulfan sulfate	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin	U		0.22	3.3	µg/Kg	1	2/24/2008
Endrin aldehyde	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin ketone	U		0.25	3.3	µg/Kg	1	2/24/2008
gamma-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor epoxide	U		0.20	1.7	µg/Kg	1	2/24/2008
Methoxychlor	U		1.7	17	µg/Kg	1	2/24/2008
Toxaphene	U		5.8	17	µg/Kg	1	2/24/2008
Surr: Decachlorobiphenyl	93.3			59-144	%REC	1	2/24/2008
Surr: Tetrachloro-m-xylene	85.6			56.9-130	%REC	1	2/24/2008
<b>CHLORINATED HERBICIDES</b>							
			Method: <b>SW8151</b>		Prep: SW3550 / 2/22/08		Analyst: <b>JLJ</b>
2,4,5-T	U		0.60	3.3	µg/Kg	1	2/26/2008
2,4,5-TP (Silvex)	U		0.50	3.3	µg/Kg	1	2/26/2008
2,4-D	U		1.0	6.6	µg/Kg	1	2/26/2008
2,4-DB	U		1.7	6.6	µg/Kg	1	2/26/2008
Dalapon	U		1.6	3.3	µg/Kg	1	2/26/2008
Dicamba	U		1.5	3.3	µg/Kg	1	2/26/2008
Dichlorprop	U		3.0	6.6	µg/Kg	1	2/26/2008
Dinoseb	U		0.50	3.3	µg/Kg	1	2/26/2008
MCPA	U		150	660	µg/Kg	1	2/26/2008
MCPP	U		140	660	µg/Kg	1	2/26/2008
Surr: DCAA	40.0			30-150	%REC	1	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.

Project: Oro Grande LF- Former Tar Area

Sample ID: F14-SB-7 (0-1)

Collection Date: 2/12/2008

Work Order: 0802304

Lab ID: 0802304-01

Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	103			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	97.6			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	U		0.50	1.7	mg/Kg	1	2/22/2008
Surr: 2-Fluorobiphenyl	88.2			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	U		1.4	13.1	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/20/08		Analyst: <b>SA</b>
Aluminum	2,700		32	87.7	mg/Kg	100	2/21/2008
Antimony	U		0.12	0.439	mg/Kg	1	2/20/2008
Arsenic	1.25		0.11	0.439	mg/Kg	1	2/20/2008
Barium	37.5		0.061	0.439	mg/Kg	1	2/20/2008
Beryllium	0.230	J	0.026	0.439	mg/Kg	1	2/20/2008
Boron	1.95	J	0.35	2.19	mg/Kg	1	2/20/2008
Cadmium	0.0580	J	0.026	0.439	mg/Kg	1	2/20/2008
Calcium	2,810		8.8	43.9	mg/Kg	1	2/20/2008
Chromium	3.59		0.061	0.439	mg/Kg	1	2/20/2008
Cobalt	1.53		0.015	0.439	mg/Kg	1	2/20/2008
Copper	1.69		0.035	0.439	mg/Kg	1	2/20/2008
Iron	4,490		3.9	43.9	mg/Kg	1	2/20/2008
Lead	2.92		0.079	0.439	mg/Kg	1	2/20/2008
Magnesium	898		2.3	43.9	mg/Kg	1	2/20/2008
Manganese	67.7		0.044	0.439	mg/Kg	1	2/20/2008
Molybdenum	0.197	J	0.088	0.439	mg/Kg	1	2/20/2008
Nickel	2.50		0.070	0.439	mg/Kg	1	2/20/2008
Potassium	608		2.3	43.9	mg/Kg	1	2/20/2008
Selenium	0.340	J	0.17	0.439	mg/Kg	1	2/20/2008
Silver	0.120	J	0.018	0.439	mg/Kg	1	2/20/2008
Sodium	19.3	J	8.0	43.9	mg/Kg	1	2/20/2008
Strontium	11.0		0.088	0.439	mg/Kg	1	2/20/2008

Qualifiers: U - Analyzed for but Not Detected

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B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**
**Date:** February 28, 2008

**Client:** Malcolm Pirnie, Inc.

**Project:** Oro Grande LF- Former Tar Area

**Sample ID:** F14-SB-7 (0-1)

**Collection Date:** 2/12/2008

**Work Order:** 0802304

**Lab ID:** 0802304-01

**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	0.149	J	0.044	0.439	mg/Kg	1	2/20/2008
Tin	1.07	J	0.35	2.19	mg/Kg	1	2/20/2008
Titanium	80.9		0.061	0.439	mg/Kg	1	2/20/2008
Vanadium	9.97		0.049	0.439	mg/Kg	1	2/20/2008
Zinc	9.42		0.088	0.439	mg/Kg	1	2/20/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>
Lithium	U		4.4	4.39	mg/Kg	1	2/27/2008
<b>LOW-LEVEL TCL SEMIVOLATILE ORGANICS</b>			Method: <b>SW8270</b>		Prep: SW3541 / 2/19/08		Analyst: <b>LG</b>
1,1'-Biphenyl	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,5-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,6-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dimethylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dinitrophenol	U		30	30	µg/Kg	1	2/20/2008
2,4-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2,6-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chloronaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylnaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3&4-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3,3'-Dichlorobenzidine	U		6.6	6.6	µg/Kg	1	2/20/2008
3-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4,6-Dinitro-2-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Bromophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloro-3-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chlorophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Nitroaniline	U		30	30	µg/Kg	1	2/20/2008
4-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acetophenone	U		6.6	6.6	µg/Kg	1	2/20/2008
Anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Atrazine	U		6.6	6.6	µg/Kg	1	2/20/2008
Benz(a)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzaldehyde	U		6.6	6.6	µg/Kg	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.

Project: Oro Grande LF- Former Tar Area

Sample ID: F14-SB-7 (0-1)

Collection Date: 2/12/2008

Work Order: 0802304

Lab ID: 0802304-01

Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Benzo(a)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(b)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(g,h,i)perylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(k)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroethoxy)methane	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroethyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroisopropyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Bis(2-ethylhexyl)phthalate</b>	<b>7.9</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Butyl benzyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Caprolactam	U		6.6	6.6	µg/Kg	1	2/20/2008
Carbazole	U		6.6	6.6	µg/Kg	1	2/20/2008
Chrysene	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Di-n-butyl phthalate</b>	<b>8.3</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Di-n-octyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenz(a,h)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenzofuran	U		6.6	6.6	µg/Kg	1	2/20/2008
Diethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dimethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluorene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobutadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorocyclopentadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachloroethane	U		6.6	6.6	µg/Kg	1	2/20/2008
Indeno(1,2,3-cd)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Isophorone	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodi-n-propylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodiphenylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
Naphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
Nitrobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Pentachlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenanthrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Surr: 2,4,6-Tribromophenol	71.0			36-126	%REC	1	2/20/2008
Surr: 2-Fluorobiphenyl	79.4			43-125	%REC	1	2/20/2008
Surr: 2-Fluorophenol	83.7			37-125	%REC	1	2/20/2008
Surr: 4-Terphenyl-d14	91.5			32-125	%REC	1	2/20/2008
Surr: Nitrobenzene-d5	76.4			37-125	%REC	1	2/20/2008
Surr: Phenol-d6	89.9			40-125	%REC	1	2/20/2008

Qualifiers: U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.

Project: Oro Grande LF- Former Tar Area

Sample ID: F14-SB-7 (0-1)

Collection Date: 2/12/2008

Work Order: 0802304

Lab ID: 0802304-01

Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>			Analyst: <b>RKG</b>	
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/25/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/25/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/25/2008
Acetone	U		2.0	25	µg/Kg	1	2/25/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
Bromoform	U		0.50	10	µg/Kg	1	2/25/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/25/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/25/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/25/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/25/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/25/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/25/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/25/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/25/2008
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
<b>Dichloromethane</b>	<b>3.8</b>	<b>J</b>	<b>3.0</b>	<b>10</b>	<b>µg/Kg</b>	<b>1</b>	<b>2/25/2008</b>
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/25/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/25/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/25/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/25/2008

Qualifiers: U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.

Project: Oro Grande LF- Former Tar Area

Sample ID: F14-SB-7 (0-1)

Collection Date: 2/12/2008

Work Order: 0802304

Lab ID: 0802304-01

Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Styrene	U		0.70	5.0	µg/Kg	1	2/25/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/25/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/25/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/25/2008
Surr: 1,2-Dichloroethane-d4	98.1			70-128	%REC	1	2/25/2008
Surr: 4-Bromofluorobenzene	105			73-126	%REC	1	2/25/2008
Surr: Dibromofluoromethane	102			71-128	%REC	1	2/25/2008
Surr: Toluene-d8	103			73-127	%REC	1	2/25/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/22/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/22/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
Percent Moisture	1.23		0.010	0.0100	wt%	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>				Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.65	0.650	mg/Kg	5	2/20/2008
Phosphorus, Total (As P)	62.0		1.0	2.50	mg/Kg	5	2/20/2008
Phosphorus, Total Orthophosphate (As P)	U		0.65	0.650	mg/Kg	5	2/20/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SID</b>				Analyst: <b>IGF</b>
Silica, Dissolved (as SiO2)	76.0		0.10	0.500	mg/kg	5	2/26/2008

## Qualifiers:

U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Former Tar Area  
**Sample ID:** F14-SB-8 (0-1)  
**Collection Date:** 2/12/2008

**Work Order:** 0802304  
**Lab ID:** 0802304-02  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>MISCELLANEOUS PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
alpha-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
gamma-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
<b>ORGANOCHLORINE PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
4,4'-DDD	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDE	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDT	U		0.23	3.3	µg/Kg	1	2/24/2008
Aldrin	U		0.20	1.7	µg/Kg	1	2/24/2008
alpha-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
beta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Chlordane	U		3.0	17	µg/Kg	1	2/24/2008
delta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Dieldrin	U		0.20	3.3	µg/Kg	1	2/24/2008
Endosulfan I	U		0.20	1.7	µg/Kg	1	2/24/2008
Endosulfan II	U		0.30	3.3	µg/Kg	1	2/24/2008
Endosulfan sulfate	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin	U		0.22	3.3	µg/Kg	1	2/24/2008
Endrin aldehyde	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin ketone	U		0.25	3.3	µg/Kg	1	2/24/2008
gamma-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor epoxide	U		0.20	1.7	µg/Kg	1	2/24/2008
Methoxychlor	U		1.7	17	µg/Kg	1	2/24/2008
Toxaphene	U		5.8	17	µg/Kg	1	2/24/2008
Surr: Decachlorobiphenyl	88.7			59-144	%REC	1	2/24/2008
Surr: Tetrachloro-m-xylene	80.6			56.9-130	%REC	1	2/24/2008
<b>CHLORINATED HERBICIDES</b>							
			Method: <b>SW8151</b>		Prep: SW3550 / 2/22/08		Analyst: <b>JLJ</b>
2,4,5-T	U		0.60	3.3	µg/Kg	1	2/24/2008
2,4,5-TP (Silvex)	U		0.50	3.3	µg/Kg	1	2/24/2008
2,4-D	U		1.0	6.6	µg/Kg	1	2/24/2008
2,4-DB	U		1.7	6.6	µg/Kg	1	2/24/2008
Dalapon	U		1.6	3.3	µg/Kg	1	2/24/2008
Dicamba	U		1.5	3.3	µg/Kg	1	2/24/2008
Dichlorprop	U		3.0	6.6	µg/Kg	1	2/24/2008
Dinoseb	U		0.50	3.3	µg/Kg	1	2/24/2008
MCPA	U		150	660	µg/Kg	1	2/24/2008
MCPP	U		140	660	µg/Kg	1	2/24/2008
Surr: DCAA	40.3			30-150	%REC	1	2/24/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.

Project: Oro Grande LF- Former Tar Area

Sample ID: F14-SB-8 (0-1)

Collection Date: 2/12/2008

Work Order: 0802304

Lab ID: 0802304-02

Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	98.5			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	94.0			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	0.51	J	0.50	1.7	mg/Kg	1	2/22/2008
Surr: 2-Fluorobiphenyl	88.4			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	U		1.4	12.8	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/20/08		Analyst: <b>SA</b>
Aluminum	2,970		35	93.5	mg/Kg	100	2/21/2008
Antimony	U		0.13	0.467	mg/Kg	1	2/20/2008
Arsenic	1.35		0.12	0.467	mg/Kg	1	2/20/2008
Barium	35.9		0.065	0.467	mg/Kg	1	2/20/2008
Beryllium	0.196	J	0.028	0.467	mg/Kg	1	2/20/2008
Boron	1.45	J	0.37	2.34	mg/Kg	1	2/20/2008
Cadmium	U		0.028	0.467	mg/Kg	1	2/20/2008
Calcium	7,060		9.3	46.7	mg/Kg	1	2/20/2008
Chromium	3.38		0.065	0.467	mg/Kg	1	2/20/2008
Cobalt	1.23		0.016	0.467	mg/Kg	1	2/20/2008
Copper	1.72		0.037	0.467	mg/Kg	1	2/20/2008
Iron	3,690		4.1	46.7	mg/Kg	1	2/20/2008
Lead	2.87		0.084	0.467	mg/Kg	1	2/20/2008
Magnesium	1,050		2.4	46.7	mg/Kg	1	2/20/2008
Manganese	59.2		0.047	0.467	mg/Kg	1	2/20/2008
Molybdenum	0.100	J	0.093	0.467	mg/Kg	1	2/20/2008
Nickel	2.49		0.075	0.467	mg/Kg	1	2/20/2008
Potassium	695		2.4	46.7	mg/Kg	1	2/20/2008
Selenium	0.324	J	0.18	0.467	mg/Kg	1	2/20/2008
Silver	0.105	J	0.019	0.467	mg/Kg	1	2/20/2008
Sodium	U		8.5	46.7	mg/Kg	1	2/20/2008
Strontium	20.8		0.093	0.467	mg/Kg	1	2/20/2008

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**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Former Tar Area  
**Sample ID:** F14-SB-8 (0-1)  
**Collection Date:** 2/12/2008

**Work Order:** 0802304  
**Lab ID:** 0802304-02  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	0.0576	J	0.047	0.467	mg/Kg	1	2/20/2008
Tin	1.05	J	0.37	2.34	mg/Kg	1	2/20/2008
Titanium	81.1		0.065	0.467	mg/Kg	1	2/20/2008
Vanadium	7.26		0.052	0.467	mg/Kg	1	2/20/2008
Zinc	8.33		0.093	0.467	mg/Kg	1	2/20/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>
Lithium	U		4.5	4.46	mg/Kg	1	2/27/2008
<b>LOW-LEVEL TCL SEMIVOLATILE ORGANICS</b>			Method: <b>SW8270</b>		Prep: SW3541 / 2/19/08		Analyst: <b>LG</b>
1,1'-Biphenyl	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,5-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,6-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dimethylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dinitrophenol	U		30	30	µg/Kg	1	2/20/2008
2,4-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2,6-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chloronaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylnaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3&4-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3,3'-Dichlorobenzidine	U		6.6	6.6	µg/Kg	1	2/20/2008
3-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4,6-Dinitro-2-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Bromophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloro-3-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chlorophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Nitroaniline	U		30	30	µg/Kg	1	2/20/2008
4-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acetophenone	U		6.6	6.6	µg/Kg	1	2/20/2008
Anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Atrazine	U		6.6	6.6	µg/Kg	1	2/20/2008
Benz(a)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzaldehyde	U		6.6	6.6	µg/Kg	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected

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# e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.

Project: Oro Grande LF- Former Tar Area

Sample ID: F14-SB-8 (0-1)

Collection Date: 2/12/2008

Work Order: 0802304

Lab ID: 0802304-02

Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Benzo(a)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(b)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(g,h,i)perylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(k)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroethoxy)methane	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroethyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroisopropyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Bis(2-ethylhexyl)phthalate</b>	<b>15</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Butyl benzyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Caprolactam	U		6.6	6.6	µg/Kg	1	2/20/2008
Carbazole	U		6.6	6.6	µg/Kg	1	2/20/2008
Chrysene	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Di-n-butyl phthalate</b>	<b>11</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Di-n-octyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenz(a,h)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenzofuran	U		6.6	6.6	µg/Kg	1	2/20/2008
Diethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dimethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluorene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobutadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorocyclopentadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachloroethane	U		6.6	6.6	µg/Kg	1	2/20/2008
Indeno(1,2,3-cd)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Isophorone	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodi-n-propylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodiphenylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
Naphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
Nitrobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Pentachlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenanthrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Surr: 2,4,6-Tribromophenol	78.7			36-126	%REC	1	2/20/2008
Surr: 2-Fluorobiphenyl	80.2			43-125	%REC	1	2/20/2008
Surr: 2-Fluorophenol	84.8			37-125	%REC	1	2/20/2008
Surr: 4-Terphenyl-d14	94.4			32-125	%REC	1	2/20/2008
Surr: Nitrobenzene-d5	76.2			37-125	%REC	1	2/20/2008
Surr: Phenol-d6	82.4			40-125	%REC	1	2/20/2008

Qualifiers: U - Analyzed for but Not Detected

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B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

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P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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## e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF- Former Tar Area  
 Sample ID: F14-SB-8 (0-1)  
 Collection Date: 2/12/2008

Work Order: 0802304  
 Lab ID: 0802304-02  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>			Analyst: <b>RKG</b>	
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichloro-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/25/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/25/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/25/2008
Acetone	U		2.0	25	µg/Kg	1	2/25/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
Bromoform	U		0.50	10	µg/Kg	1	2/25/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/25/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/25/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/25/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/25/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/25/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/25/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/25/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/25/2008
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
<b>Dichloromethane</b>	<b>3.9</b>	<b>J</b>	<b>3.0</b>	<b>10</b>	<b>µg/Kg</b>	<b>1</b>	<b>2/25/2008</b>
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/25/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/25/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/25/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/25/2008

Qualifiers: U - Analyzed for but Not Detected

S - Spike Recovery outside accepted recovery limits

J - Analyte detected below quantitation limits

P - Dual Column results RPD &gt; 40%

B - Analyte detected in the associated Method Blank

E - Value above quantitation range

\* - Value exceeds Maximum Contaminant Level

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.

Project: Oro Grande LF- Former Tar Area

Sample ID: F14-SB-8 (0-1)

Collection Date: 2/12/2008

Work Order: 0802304

Lab ID: 0802304-02

Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Styrene	U		0.70	5.0	µg/Kg	1	2/25/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/25/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/25/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/25/2008
Surr: 1,2-Dichloroethane-d4	90.6			70-128	%REC	1	2/25/2008
Surr: 4-Bromofluorobenzene	102			73-126	%REC	1	2/25/2008
Surr: Dibromofluoromethane	96.0			71-128	%REC	1	2/25/2008
Surr: Toluene-d8	99.8			73-127	%REC	1	2/25/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/22/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/22/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
Percent Moisture	1.90		0.010	0.0100	wt%	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>				Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.13	0.130	mg/Kg	1	2/20/2008
Phosphorus, Total (As P)	19.4		0.20	0.500	mg/Kg	1	2/20/2008
Phosphorus, Total Orthophosphate (As P)	U		0.13	0.130	mg/Kg	1	2/20/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SID</b>				Analyst: <b>IGF</b>
Silica, Dissolved (as SiO2)	18.3		0.020	0.100	mg/kg	1	2/26/2008

**Qualifiers:**

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B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.

Project: Oro Grande LF- Former Tar Area

Sample ID: Dup-1

Collection Date: 2/12/2008

Work Order: 0802304

Lab ID: 0802304-03

Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>MISCELLANEOUS PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
alpha-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
gamma-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
<b>ORGANOCHLORINE PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
4,4'-DDD	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDE	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDT	U		0.23	3.3	µg/Kg	1	2/24/2008
Aldrin	U		0.20	1.7	µg/Kg	1	2/24/2008
alpha-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
beta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Chlordane	U		3.0	17	µg/Kg	1	2/24/2008
delta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Dieldrin	U		0.20	3.3	µg/Kg	1	2/24/2008
Endosulfan I	U		0.20	1.7	µg/Kg	1	2/24/2008
Endosulfan II	U		0.30	3.3	µg/Kg	1	2/24/2008
Endosulfan sulfate	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin	U		0.22	3.3	µg/Kg	1	2/24/2008
Endrin aldehyde	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin ketone	U		0.25	3.3	µg/Kg	1	2/24/2008
gamma-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor epoxide	U		0.20	1.7	µg/Kg	1	2/24/2008
Methoxychlor	U		1.7	17	µg/Kg	1	2/24/2008
Toxaphene	U		5.8	17	µg/Kg	1	2/24/2008
Surr: Decachlorobiphenyl	92.0			59-144	%REC	1	2/24/2008
Surr: Tetrachloro-m-xylene	83.8			56.9-130	%REC	1	2/24/2008
<b>CHLORINATED HERBICIDES</b>							
			Method: <b>SW8151</b>		Prep: SW3550 / 2/22/08		Analyst: <b>JLJ</b>
2,4,5-T	U		0.60	3.3	µg/Kg	1	2/24/2008
2,4,5-TP (Silvex)	U		0.50	3.3	µg/Kg	1	2/24/2008
2,4-D	U		1.0	6.6	µg/Kg	1	2/24/2008
2,4-DB	U		1.7	6.6	µg/Kg	1	2/24/2008
Dalapon	U		1.6	3.3	µg/Kg	1	2/24/2008
Dicamba	U		1.5	3.3	µg/Kg	1	2/24/2008
Dichlorprop	U		3.0	6.6	µg/Kg	1	2/24/2008
Dinoseb	U		0.50	3.3	µg/Kg	1	2/24/2008
MCPA	U		150	660	µg/Kg	1	2/24/2008
MCPP	U		140	660	µg/Kg	1	2/24/2008
Surr: DCAA	30.4			30-150	%REC	1	2/24/2008

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P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.

Project: Oro Grande LF- Former Tar Area

Sample ID: Dup-1

Collection Date: 2/12/2008

Work Order: 0802304

Lab ID: 0802304-03

Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	97.0			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	94.2			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	U		0.50	1.7	mg/Kg	1	2/22/2008
Surr: 2-Fluorobiphenyl	86.5			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	U		1.4	13.1	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/20/08		Analyst: <b>SA</b>
Aluminum	2,980		36	97.1	mg/Kg	100	2/21/2008
Antimony	U		0.14	0.485	mg/Kg	1	2/20/2008
Arsenic	1.35		0.13	0.485	mg/Kg	1	2/20/2008
Barium	34.0		0.068	0.485	mg/Kg	1	2/20/2008
Beryllium	0.210	J	0.029	0.485	mg/Kg	1	2/20/2008
Boron	1.31	J	0.39	2.43	mg/Kg	1	2/20/2008
Cadmium	U		0.029	0.485	mg/Kg	1	2/20/2008
Calcium	7,460		9.7	48.5	mg/Kg	1	2/20/2008
Chromium	3.44		0.068	0.485	mg/Kg	1	2/20/2008
Cobalt	1.27		0.017	0.485	mg/Kg	1	2/20/2008
Copper	1.99		0.039	0.485	mg/Kg	1	2/20/2008
Iron	3,850		4.3	48.5	mg/Kg	1	2/20/2008
Lead	3.03		0.087	0.485	mg/Kg	1	2/20/2008
Magnesium	1,100		2.5	48.5	mg/Kg	1	2/20/2008
Manganese	60.5		0.049	0.485	mg/Kg	1	2/20/2008
Molybdenum	0.132	J	0.097	0.485	mg/Kg	1	2/20/2008
Nickel	2.59		0.078	0.485	mg/Kg	1	2/20/2008
Potassium	753		2.5	48.5	mg/Kg	1	2/20/2008
Selenium	0.422	J	0.18	0.485	mg/Kg	1	2/20/2008
Silver	0.108	J	0.019	0.485	mg/Kg	1	2/20/2008
Sodium	U		8.8	48.5	mg/Kg	1	2/20/2008
Strontium	20.3		0.097	0.485	mg/Kg	1	2/20/2008

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E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Former Tar Area  
**Sample ID:** Dup-1  
**Collection Date:** 2/12/2008

**Work Order:** 0802304  
**Lab ID:** 0802304-03  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	U		0.049	0.485	mg/Kg	1	2/20/2008
<b>Tin</b>	<b>1.06</b>	J	<b>0.39</b>	<b>2.43</b>	<b>mg/Kg</b>	1	2/20/2008
<b>Titanium</b>	<b>80.0</b>		<b>0.068</b>	<b>0.485</b>	<b>mg/Kg</b>	1	2/20/2008
<b>Vanadium</b>	<b>7.37</b>		<b>0.054</b>	<b>0.485</b>	<b>mg/Kg</b>	1	2/20/2008
<b>Zinc</b>	<b>8.71</b>		<b>0.097</b>	<b>0.485</b>	<b>mg/Kg</b>	1	2/20/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>
Lithium	U		4.7	4.67	mg/Kg	1	2/27/2008
<b>LOW-LEVEL TCL SEMIVOLATILE ORGANICS</b>			Method: <b>SW8270</b>		Prep: SW3541 / 2/19/08		Analyst: <b>LG</b>
1,1'-Biphenyl	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,5-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,6-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dimethylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dinitrophenol	U		30	30	µg/Kg	1	2/20/2008
2,4-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2,6-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chloronaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylnaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3&4-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3,3'-Dichlorobenzidine	U		6.6	6.6	µg/Kg	1	2/20/2008
3-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4,6-Dinitro-2-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Bromophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloro-3-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chlorophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Nitroaniline	U		30	30	µg/Kg	1	2/20/2008
4-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acetophenone	U		6.6	6.6	µg/Kg	1	2/20/2008
Anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Atrazine	U		6.6	6.6	µg/Kg	1	2/20/2008
Benz(a)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzaldehyde	U		6.6	6.6	µg/Kg	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected

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P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.

Project: Oro Grande LF- Former Tar Area

Sample ID: Dup-1

Collection Date: 2/12/2008

Work Order: 0802304

Lab ID: 0802304-03

Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Benzo(a)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(b)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(g,h,i)perylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(k)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroethoxy)methane	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroethyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroisopropyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Bis(2-ethylhexyl)phthalate</b>	<b>18</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Butyl benzyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Caprolactam	U		6.6	6.6	µg/Kg	1	2/20/2008
Carbazole	U		6.6	6.6	µg/Kg	1	2/20/2008
Chrysene	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Di-n-butyl phthalate</b>	<b>10</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Di-n-octyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenz(a,h)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenzofuran	U		6.6	6.6	µg/Kg	1	2/20/2008
Diethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dimethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluorene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobutadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorocyclopentadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachloroethane	U		6.6	6.6	µg/Kg	1	2/20/2008
Indeno(1,2,3-cd)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Isophorone	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodi-n-propylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodiphenylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
Naphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
Nitrobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Pentachlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenanthrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Surr: 2,4,6-Tribromophenol	71.8			36-126	%REC	1	2/20/2008
Surr: 2-Fluorobiphenyl	72.8			43-125	%REC	1	2/20/2008
Surr: 2-Fluorophenol	80.0			37-125	%REC	1	2/20/2008
Surr: 4-Terphenyl-d14	88.2			32-125	%REC	1	2/20/2008
Surr: Nitrobenzene-d5	78.0			37-125	%REC	1	2/20/2008
Surr: Phenol-d6	86.8			40-125	%REC	1	2/20/2008

Qualifiers: U - Analyzed for but Not Detected

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B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.

Project: Oro Grande LF- Former Tar Area

Sample ID: Dup-1

Collection Date: 2/12/2008

Work Order: 0802304

Lab ID: 0802304-03

Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>				Analyst: <b>RKG</b>
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/25/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/25/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/25/2008
Acetone	U		2.0	25	µg/Kg	1	2/25/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
Bromoform	U		0.50	10	µg/Kg	1	2/25/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/25/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/25/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/25/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/25/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/25/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/25/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/25/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/25/2008
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
Dichloromethane	U		3.0	10	µg/Kg	1	2/25/2008
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/25/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/25/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/25/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/25/2008

Qualifiers: U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.

Project: Oro Grande LF- Former Tar Area

Sample ID: Dup-1

Collection Date: 2/12/2008

Work Order: 0802304

Lab ID: 0802304-03

Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Styrene	U		0.70	5.0	µg/Kg	1	2/25/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/25/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/25/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/25/2008
Surr: 1,2-Dichloroethane-d4	96.7			70-128	%REC	1	2/25/2008
Surr: 4-Bromofluorobenzene	101			73-126	%REC	1	2/25/2008
Surr: Dibromofluoromethane	100			71-128	%REC	1	2/25/2008
Surr: Toluene-d8	101			73-127	%REC	1	2/25/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/22/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/22/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
Percent Moisture	<b>1.29</b>		<b>0.010</b>	<b>0.0100</b>	<b>wt%</b>	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>				Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.65	0.650	mg/Kg	5	2/20/2008
Phosphorus, Total (As P)	<b>64.0</b>		<b>1.0</b>	<b>2.50</b>	<b>mg/Kg</b>	5	2/20/2008
Phosphorus, Total Orthophosphate (As P)	U		0.65	0.650	mg/Kg	5	2/20/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SID</b>				Analyst: <b>IGF</b>
Silica, Dissolved (as SiO2)	<b>35.8</b>		<b>0.040</b>	<b>0.200</b>	<b>mg/kg</b>	2	2/26/2008

## Qualifiers:

U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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## e-Lab Analytical, Inc.

Date: Feb 28 2008

CLIENT: Malcolm Pirnie, Inc.

## QC BATCH REPORT

Work Order: 0802304

Project: Oro Grande LF- Former Tar Area

Batch ID: 28324

Instrument ID ECD\_1

Method: SW8081

MBLK		Sample ID: PBLKS1-080220			Units: µg/Kg			Analysis Date: 02/24/08 12:45		
Client ID:		Run ID: ECD_1_080223D			SeqNo: 1335513		Prep Date: 2/20/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	U	3.3								
4,4'-DDE	U	3.3								
4,4'-DDT	U	3.3								
Aldrin	U	1.7								
alpha-BHC	U	1.7								
beta-BHC	U	1.7								
Chlordane	U	17								
delta-BHC	U	1.7								
Dieldrin	U	3.3								
Endosulfan I	U	1.7								
Endosulfan II	U	3.3								
Endosulfan sulfate	U	3.3								
Endrin	U	3.3								
Endrin aldehyde	U	3.3								
Endrin ketone	U	3.3								
gamma-BHC	U	1.7								
Heptachlor	U	1.7								
Heptachlor epoxide	U	1.7								
Methoxychlor	U	17								
Toxaphene	U	17								
Surr: Decachlorobiphenyl	6.233	3.3	6.667	0	93.5	59-144	0			
Surr: Tetrachloro-m-xylene	5.783	1.6	6.667	0	86.7	56.9-130	0			

MBLK		Sample ID: PBLKS1-080220			Units: µg/Kg			Analysis Date: 02/24/08 12:45		
Client ID:		Run ID: ECD_1_080223D			SeqNo: 1335528		Prep Date: 2/20/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	U	1.7								
gamma-Chlordane	U	1.7								

ND - Not Detected at the Reporting Limit

S - Spike Recovery outside accepted recovery limits

B - Analyte detected in assoc. Method Blank

J - Analyte detected below quantitation limits

R - RPD outside accepted recovery limits

U - Analyzed for but not detected

O - Referenced analyte value is &gt; 4 times amount spiked

P - Dual Column results percent difference &gt; 40%

E - Value above quantitation range

QC Page: 1 of 35

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: **28324** Instrument ID **ECD\_1** Method: **SW8081**

LCS		Sample ID: <b>PLCSS1-080220</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 13:19</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335514</b>		Prep Date: <b>2/20/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	15.86	3.3	16.67	0	95.1	53-138	0			
4,4'-DDE	15.64	3.3	16.67	0	93.8	57-136	0			
4,4'-DDT	16.11	3.3	16.67	0	96.7	53-139	0			
Aldrin	6.995	1.7	8.333	0	83.9	52-130	0			
alpha-BHC	7.352	1.7	8.333	0	88.2	52-130	0			
beta-BHC	7.426	1.7	8.333	0	89.1	62-130	0			
delta-BHC	7.077	1.7	8.333	0	84.9	41-137	0			
Dieldrin	15.4	3.3	16.67	0	92.4	54-138	0			
Endosulfan I	7.705	1.7	8.333	0	92.5	55-132	0			
Endosulfan II	15.06	3.3	16.67	0	90.3	59-134	0			
Endosulfan sulfate	16.07	3.3	16.67	0	96.4	54-141	0			
Endrin	19.29	3.3	16.67	0	116	60-157	0			
Endrin aldehyde	13.7	3.3	16.67	0	82.2	56-146	0			
Endrin ketone	16.81	3.3	16.67	0	101	56-153	0			
gamma-BHC	7.702	1.7	8.333	0	92.4	52-133	0			
Heptachlor	7.62	1.7	8.333	0	91.4	54-134	0			
Heptachlor epoxide	7.397	1.7	8.333	0	88.8	58-130	0			
Methoxychlor	85.99	17	83.33	0	103	60-140	0			
Surr: Decachlorobiphenyl	6.944	3.3	6.667	0	104	60-150	0			
Surr: Tetrachloro-m-xylene	6.044	1.6	6.667	0	90.7	60-135	0			

LCS		Sample ID: <b>PLCSS1-080220</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 13:19</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335529</b>		Prep Date: <b>2/20/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	7.175	1.7	8.333	0	86.1	55-132	0			
gamma-Chlordane	7.337	1.7	8.333	0	88	60-129	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

# QC BATCH REPORT

Batch ID: **28324** Instrument ID **ECD\_1** Method: **SW8081**

MS Sample ID: <b>0802304-01DMS</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/24/08 16:10</b>			
Client ID: <b>F14-SB-7 (0-1)</b>		Run ID: <b>ECD_1_080223D</b>		SeqNo: <b>1335519</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	15	3.3	16.64	0	90.1	53-138	0			
4,4'-DDE	14.96	3.3	16.64	0	89.9	57-136	0			
4,4'-DDT	14.92	3.3	16.64	0	89.6	53-139	0			
Aldrin	6.584	1.7	8.319	0	79.1	52-130	0			
alpha-BHC	7.075	1.7	8.319	0	85	52-130	0			
beta-BHC	7.523	1.7	8.319	0	90.4	62-130	0			
delta-BHC	7.593	1.7	8.319	0	91.3	41-137	0			
Dieldrin	14.83	3.3	16.64	0	89.1	54-138	0			
Endosulfan I	7.343	1.7	8.319	0	88.3	55-132	0			
Endosulfan II	14.5	3.3	16.64	0	87.2	59-134	0			
Endosulfan sulfate	16.35	3.3	16.64	0	98.2	54-141	0			
Endrin	18.47	3.3	16.64	0	111	60-157	0			
Endrin aldehyde	15.69	3.3	16.64	0	94.3	56-146	0			
Endrin ketone	16.93	3.3	16.64	0	102	56-153	0			
gamma-BHC	7.268	1.7	8.319	0	87.4	52-133	0			
Heptachlor	7.272	1.7	8.319	0	87.4	54-134	0			
Heptachlor epoxide	6.87	1.7	8.319	0	82.6	58-130	0			
Methoxychlor	85.56	17	83.19	0	103	60-140	0			
Surr: Decachlorobiphenyl	6.142	3.3	6.656	0	92.3	60-150	0			
Surr: Tetrachloro-m-xylene	5.499	1.6	6.656	0	82.6	60-135	0			

MS Sample ID: <b>0802304-01DMS</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/24/08 16:10</b>			
Client ID: <b>F14-SB-7 (0-1)</b>		Run ID: <b>ECD_1_080223D</b>		SeqNo: <b>1335534</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	6.877	1.7	8.319	0	82.7	55-132	0			
gamma-Chlordane	7.267	1.7	8.319	0	87.3	60-129	0			

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

# QC BATCH REPORT

Batch ID: **28324** Instrument ID **ECD\_1** Method: **SW8081**

MSD		Sample ID: <b>0802304-01DMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 16:44</b>		
Client ID: <b>F14-SB-7 (0-1)</b>		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335520</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	14.45	3.3	16.66	0	86.8	53-138	15	3.69	30	
4,4'-DDE	14.54	3.3	16.66	0	87.3	57-136	14.96	2.79	30	
4,4'-DDT	14.49	3.3	16.66	0	87	53-139	14.92	2.9	30	
Aldrin	6.272	1.7	8.331	0	75.3	52-130	6.584	4.85	30	
alpha-BHC	6.759	1.7	8.331	0	81.1	52-130	7.075	4.56	30	
beta-BHC	7.186	1.7	8.331	0	86.3	62-130	7.523	4.59	30	
delta-BHC	7.229	1.7	8.331	0	86.8	41-137	7.593	4.91	30	
Dieldrin	14.31	3.3	16.66	0	85.9	54-138	14.83	3.59	30	
Endosulfan I	7.109	1.7	8.331	0	85.3	55-132	7.343	3.24	30	
Endosulfan II	14	3.3	16.66	0	84	59-134	14.5	3.55	30	
Endosulfan sulfate	15.64	3.3	16.66	0	93.9	54-141	16.35	4.41	30	
Endrin	17.77	3.3	16.66	0	107	60-157	18.47	3.88	30	
Endrin aldehyde	15.22	3.3	16.66	0	91.3	56-146	15.69	3.1	30	
Endrin ketone	16.55	3.3	16.66	0	99.3	56-153	16.93	2.29	30	
gamma-BHC	6.934	1.7	8.331	0	83.2	52-133	7.268	4.7	30	
Heptachlor	6.941	1.7	8.331	0	83.3	54-134	7.272	4.65	30	
Heptachlor epoxide	6.668	1.7	8.331	0	80	58-130	6.87	2.98	30	
Methoxychlor	83.98	17	83.31	0	101	60-140	85.56	1.86	30	
Surr: Decachlorobiphenyl	6.005	3.3	6.664	0	90.1	60-150	6.142	2.25	30	
Surr: Tetrachloro-m-xylene	5.218	1.6	6.664	0	78.3	60-135	5.499	5.25	30	

MSD		Sample ID: <b>0802304-01DMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 16:44</b>		
Client ID: <b>F14-SB-7 (0-1)</b>		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335535</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	6.624	1.7	8.331	0	79.5	55-132	6.877	3.75	30	
gamma-Chlordane	7.218	1.7	8.331	0	86.6	60-129	7.267	0.676	30	

The following samples were analyzed in this batch:

0802304-01D	0802304-02D	0802304-03D
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ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

# QC BATCH REPORT

Batch ID: **28325** Instrument ID **ECD\_7** Method: **SW8082**

MBLK		Sample ID: <b>PBLKS2-080220</b>		Units: <b>µg/Kg</b>		Analysis Date: <b>02/25/08 23:35</b>				
Client ID:		Run ID: <b>ECD_7_080225A</b>		SeqNo: <b>1335803</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	U	17								
Aroclor 1221	U	17								
Aroclor 1232	U	17								
Aroclor 1242	U	17								
Aroclor 1248	U	17								
Aroclor 1254	U	17								
Aroclor 1260	U	17								
<i>Surr: Decachlorobiphenyl</i>	6.346	1.6	6.667	0	95.2	54-143	0			
<i>Surr: Tetrachloro-m-xylene</i>	6.115	1.6	6.667	0	91.7	55-137	0			

LCS		Sample ID: <b>PLCSS2-080220</b>		Units: <b>µg/Kg</b>		Analysis Date: <b>02/26/08 0:09</b>				
Client ID:		Run ID: <b>ECD_7_080225A</b>		SeqNo: <b>1335804</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	149.8	17	166.7	0	89.9	53-135	0			
Aroclor 1260	158.4	17	166.7	0	95	54-137	0			
<i>Surr: Decachlorobiphenyl</i>	7.065	1.6	6.667	0	106	54-143	0			
<i>Surr: Tetrachloro-m-xylene</i>	6.785	1.6	6.667	0	102	55-137	0			

MS		Sample ID: <b>0802304-02CMS</b>		Units: <b>µg/Kg</b>		Analysis Date: <b>02/26/08 6:24</b>				
Client ID: <b>F14-SB-8 (0-1)</b>		Run ID: <b>ECD_7_080225A</b>		SeqNo: <b>1335815</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	151.3	17	166.4	0	91	53-135	0			
Aroclor 1260	162.9	17	166.4	0	97.9	54-137	0			
<i>Surr: Decachlorobiphenyl</i>	6.282	1.6	6.656	0	94.4	54-143	0			
<i>Surr: Tetrachloro-m-xylene</i>	6.143	1.6	6.656	0	92.3	55-137	0			

MSD		Sample ID: <b>0802304-02CMSD</b>		Units: <b>µg/Kg</b>		Analysis Date: <b>02/26/08 6:58</b>				
Client ID: <b>F14-SB-8 (0-1)</b>		Run ID: <b>ECD_7_080225A</b>		SeqNo: <b>1335816</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	154.1	17	166.6	0	92.5	53-135	151.3	1.84	30	
Aroclor 1260	165.8	17	166.6	0	99.5	54-137	162.9	1.75	30	
<i>Surr: Decachlorobiphenyl</i>	6.443	1.6	6.664	0	96.7	54-143	6.282	2.54	30	
<i>Surr: Tetrachloro-m-xylene</i>	6.248	1.6	6.664	0	93.8	55-137	6.143	1.7	30	

The following samples were analyzed in this batch:

0802304-01C	0802304-02C	0802304-03C
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ND - Not Detected at the Reporting Limit  
J - Analyte detected below quantitation limits  
O - Referenced analyte value is > 4 times amount spiked  
S - Spike Recovery outside accepted recovery limits  
R - RPD outside accepted recovery limits  
P - Dual Column results percent difference > 40%  
B - Analyte detected in assoc. Method Blank  
U - Analyzed for but not detected  
E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: **28371** Instrument ID **ECD\_5** Method: **SW8151**

**MBLK** Sample ID: **HBLKS1-080222** Units: **µg/Kg** Analysis Date: **02/24/08 12:20**

Client ID: Run ID: **ECD\_5\_080221C** SeqNo: **1335482** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	U	3.3								
2,4,5-TP (Silvex)	U	3.3								
2,4-D	U	6.6								
2,4-DB	U	6.6								
Dalapon	U	3.3								
Dicamba	U	3.3								
Dichlorprop	U	6.6								
Dinoseb	U	3.3								
MCPA	U	660								
MCPP	U	660								
Surr: DCAA	187.5	6.6	166.7	0	113	30-150	0			

**LCS** Sample ID: **HLCSS1-080222** Units: **µg/Kg** Analysis Date: **02/24/08 12:57**

Client ID: Run ID: **ECD\_5\_080221C** SeqNo: **1335483** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	82.53	3.3	83.33	0	99	50-150	0			
2,4,5-TP (Silvex)	93.76	3.3	83.33	0	113	50-150	0			
2,4-D	68.06	6.6	83.33	0	81.7	40-150	0			
2,4-DB	86.73	6.6	83.33	0	104	40-150	0			
Dalapon	88.32	3.3	83.33	0	106	30-150	0			
Dicamba	77.37	3.3	83.33	0	92.8	40-150	0			
Dichlorprop	83.16	6.6	83.33	0	99.8	40-150	0			
Dinoseb	77.29	3.3	83.33	0	92.7	40-150	0			
MCPA	7051	660	8333	0	84.6	40-150	0			
MCPP	7660	660	8333	0	91.9	40-150	0			
Surr: DCAA	176.7	6.6	166.7	0	106	50-150	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: **28371** Instrument ID **ECD\_5** Method: **SW8151**

MS				Sample ID: <b>0802304-01DMS</b>			Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 15:26</b>	
Client ID: <b>F14-SB-7 (0-1)</b>				Run ID: <b>ECD_5_080221C</b>			SeqNo: <b>1335504</b>		Prep Date: <b>2/22/2008</b>	
									DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	67.56	3.3	83.22	0	81.2	50-150	0			
2,4,5-TP (Silvex)	66.67	3.3	83.22	0	80.1	50-150	0			
2,4-D	53.91	6.6	83.22	0	64.8	40-150	0			
2,4-DB	77.8	6.6	83.22	0	93.5	40-150	0			
Dalapon	63.74	3.3	83.22	0	76.6	30-150	0			
Dicamba	55.25	3.3	83.22	0	66.4	40-150	0			
Dichlorprop	63.97	6.6	83.22	0	76.9	40-150	0			
Dinoseb	72	3.3	83.22	0	86.5	40-150	0			
MCPA	5862	660	8322	0	70.4	40-150	0			
MCP	4491	660	8322	0	54	40-150	0			P
Surr: DCAA	92.07	6.6	166.4	0	55.3	50-150	0			

MSD				Sample ID: <b>0802304-01DMSD</b>			Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 16:03</b>	
Client ID: <b>F14-SB-7 (0-1)</b>				Run ID: <b>ECD_5_080221C</b>			SeqNo: <b>1335505</b>		Prep Date: <b>2/22/2008</b>	
									DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	67.98	3.3	83.31	0	81.6	50-150	67.56	0.626	30	
2,4,5-TP (Silvex)	65.83	3.3	83.31	0	79	50-150	66.67	1.26	30	
2,4-D	54.52	6.6	83.31	0	65.4	40-150	53.91	1.12	30	
2,4-DB	78.07	6.6	83.31	0	93.7	40-150	77.8	0.346	30	
Dalapon	62.65	3.3	83.31	0	75.2	30-150	63.74	1.73	30	
Dicamba	55.69	3.3	83.31	0	66.8	40-150	55.25	0.787	30	
Dichlorprop	63.76	6.6	83.31	0	76.5	40-150	63.97	0.332	30	
Dinoseb	72.28	3.3	83.31	0	86.8	40-150	72	0.387	30	
MCPA	6291	660	8331	0	75.5	40-150	5862	7.06	30	
MCP	4425	660	8331	0	53.1	40-150	4491	1.47	30	P
Surr: DCAA	89.52	6.6	166.6	0	53.7	50-150	92.07	2.8	30	

The following samples were analyzed in this batch:

0802304-01D	0802304-02D	0802304-03D
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ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: **28331** Instrument ID **FID-2** Method: **SW8015M**

<b>MBLK</b>	Sample ID: <b>FBLKS1-080221</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 0:05</b>		
Client ID:	Run ID: <b>FID-2_080221A</b>				SeqNo: <b>1336416</b>		Prep Date: <b>2/21/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	U	1.7								
<i>Surr: 2-Fluorobiphenyl</i>	3.292	0.10	3.333	0	98.8	70-130	0			

<b>LCS</b>	Sample ID: <b>FLCSS1-080221</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 0:55</b>		
Client ID:	Run ID: <b>FID-2_080221A</b>				SeqNo: <b>1336417</b>		Prep Date: <b>2/21/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	39.46	1.7	33.33	0	118	70-130	0			
<i>Surr: 2-Fluorobiphenyl</i>	3.922	0.10	3.333	0	118	70-130	0			

<b>MS</b>	Sample ID: <b>0802304-01CMS</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 6:46</b>		
Client ID: <b>F14-SB-7 (0-1)</b>	Run ID: <b>FID-2_080221A</b>				SeqNo: <b>1336424</b>		Prep Date: <b>2/21/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	36.64	1.7	33.32	0.3677	109	70-130	0			
<i>Surr: 2-Fluorobiphenyl</i>	3.646	0.10	3.332	0	109	70-130	0			

<b>MSD</b>	Sample ID: <b>0802304-01CMSD</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 7:36</b>		
Client ID: <b>F14-SB-7 (0-1)</b>	Run ID: <b>FID-2_080221A</b>				SeqNo: <b>1336425</b>		Prep Date: <b>2/21/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	36.1	1.7	33.3	0.3677	107	70-130	36.64	1.51	30	
<i>Surr: 2-Fluorobiphenyl</i>	3.461	0.10	3.33	0	104	70-130	3.646	5.18	30	

The following samples were analyzed in this batch:

0802304-01C	0802304-02C	0802304-03C
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ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: **28320** Instrument ID **ICP7500** Method: **SW6020**

MBLK		Sample ID: <b>MBLKS1-022008</b>			Units: <b>mg/Kg</b>			Analysis Date: <b>02/20/08 17:15</b>		
Client ID:		Run ID: <b>ICP7500_080220A</b>			SeqNo: <b>1331444</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	U	0.50								
Arsenic	U	0.50								
Barium	0.1763	0.50								J
Beryllium	U	0.50								
Boron	U	2.5								
Cadmium	U	0.50								
Calcium	U	50								
Chromium	U	0.50								
Cobalt	U	0.50								
Copper	0.2296	0.50								J
Iron	U	50								
Lead	U	0.50								
Magnesium	U	50								
Manganese	U	0.50								
Molybdenum	U	0.50								
Nickel	U	0.50								
Potassium	U	50								
Selenium	0.2529	0.50								J
Silver	0.1023	0.50								J
Sodium	U	50								
Strontium	U	0.50								
Thallium	U	0.50								
Tin	1.129	2.5								J
Titanium	U	0.50								
Vanadium	0.1491	0.50								J
Zinc	U	0.50								

MBLK		Sample ID: <b>MBLKS1-022008</b>			Units: <b>mg/Kg</b>			Analysis Date: <b>02/21/08 13:02</b>		
Client ID:		Run ID: <b>ICP7500_080221A</b>			SeqNo: <b>1332010</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	0.6331	1.0								J

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

# QC BATCH REPORT

Batch ID: **28320** Instrument ID **ICP7500** Method: **SW6020**

LCS		Sample ID: <b>MLCSS1-022008</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 17:21</b>		
Client ID:		Run ID: <b>ICP7500_080220A</b>				SeqNo: <b>1331445</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	10.64	0.50	10	0	106	80-120	0			
Arsenic	9.387	0.50	10	0	93.9	80-120	0			
Barium	8.796	0.50	10	0	88	80-120	0			
Beryllium	8.499	0.50	10	0	85	80-120	0			
Boron	45.25	2.5	50	0	90.5	80-120	0			
Cadmium	8.779	0.50	10	0	87.8	80-120	0			
Calcium	941.4	50	1000	0	94.1	80-120	0			
Chromium	9.872	0.50	10	0	98.7	80-120	0			
Cobalt	10.2	0.50	10	0	102	80-120	0			
Copper	8.508	0.50	10	0	85.1	80-120	0			
Iron	907.2	50	1000	0	90.7	80-120	0			
Lead	8.981	0.50	10	0	89.8	80-120	0			
Magnesium	955.5	50	1000	0	95.6	80-120	0			
Manganese	9.71	0.50	10	0	97.1	80-120	0			
Molybdenum	9.003	0.50	10	0	90	80-120	0			
Nickel	8.559	0.50	10	0	85.6	80-120	0			
Potassium	953.2	50	1000	0	95.3	80-120	0			
Selenium	8.42	0.50	10	0	84.2	80-120	0			
Silver	8.833	0.50	10	0	88.3	80-120	0			
Sodium	928.3	50	1000	0	92.8	80-120	0			
Strontium	9.477	0.50	10	0	94.8	80-120	0			
Thallium	8.28	0.50	10	0	82.8	80-120	0			
Tin	10.24	2.5	10	0	102	80-120	0			
Titanium	18.18	0.50	20	0	90.9	80-120	0			
Vanadium	10.18	0.50	10	0	102	80-120	0			
Zinc	8.711	0.50	10	0	87.1	80-120	0			

LCS		Sample ID: <b>MLCSS1-022008</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/21/08 13:08</b>		
Client ID:		Run ID: <b>ICP7500_080221A</b>				SeqNo: <b>1332011</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	8.937	1.0	10	0	89.4	80-120	0			

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

# QC BATCH REPORT

Batch ID: **28320** Instrument ID **ICP7500** Method: **SW6020**

MS		Sample ID: <b>0802326-06CMS</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 19:38</b>		
Client ID:		Run ID: <b>ICP7500_080220A</b>				SeqNo: <b>1331475</b>		Prep Date: <b>2/20/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	6.395	0.48	9.615	0.1028	65.4	75-125	0			S
Arsenic	11.38	0.48	9.615	2.707	90.2	75-125	0			
Barium	77.33	0.48	9.615	30.04	492	75-125	0			S
Beryllium	7.814	0.48	9.615	0.1474	79.7	75-125	0			
Boron	45.81	2.4	48.08	4.882	85.1	75-125	0			
Cadmium	8.122	0.48	9.615	0.01902	84.3	75-125	0			
Calcium	11580	48	961.5	11180	41	75-125	0			SO
Chromium	12.39	0.48	9.615	3.049	97.2	75-125	0			
Cobalt	10.14	0.48	9.615	0.9517	95.6	75-125	0			
Copper	8.359	0.48	9.615	0.911	77.5	75-125	0			
Iron	3812	48	961.5	2791	106	75-125	0			
Lead	10.63	0.48	9.615	2.301	86.7	75-125	0			
Magnesium	2767	48	961.5	1772	104	75-125	0			
Manganese	41.98	0.48	9.615	32.92	94.2	75-125	0			
Molybdenum	8.088	0.48	9.615	0.1188	82.9	75-125	0			
Nickel	9.571	0.48	9.615	1.879	80	75-125	0			
Potassium	1777	48	961.5	809	101	75-125	0			
Selenium	8.052	0.48	9.615	0.3524	80.1	75-125	0			
Silver	7.929	0.48	9.615	0.1002	81.4	75-125	0			
Sodium	1362	48	961.5	453.8	94.5	75-125	0			
Strontium	103.2	0.48	9.615	43.66	619	75-125	0			SO
Thallium	7.51	0.48	9.615	0.0295	77.8	75-125	0			
Tin	9.144	2.4	9.615	1.089	83.8	75-125	0			
Titanium	83.28	0.48	19.23	65.6	92	75-125	0			
Vanadium	21.8	0.48	9.615	12.35	98.3	75-125	0			
Zinc	14.62	0.48	9.615	5.852	91.1	75-125	0			

MS		Sample ID: <b>0802326-06CMS</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 19:38</b>		
Client ID:		Run ID: <b>ICP7500_080220A</b>				SeqNo: <b>1333844</b>		Prep Date: <b>2/20/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	2900	0.96	9.615	2338	5840	75-125	0			SEO

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: **28320** Instrument ID **ICP7500** Method: **SW6020**

MSD		Sample ID: <b>0802326-06CMSD</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 19:44</b>		
Client ID:		Run ID: <b>ICP7500_080220A</b>				SeqNo: <b>1331476</b>		Prep Date: <b>2/20/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	6.59	0.48	9.615	0.1028	67.5	75-125	6.395	3.01	25	S
Arsenic	11.4	0.48	9.615	2.707	90.4	75-125	11.38	0.169	25	
Barium	28.5	0.48	9.615	30.04	-16	75-125	77.33	92.3	25	SR
Beryllium	7.843	0.48	9.615	0.1474	80	75-125	7.814	0.368	25	
Boron	45.91	2.4	48.08	4.882	85.3	75-125	45.81	0.231	25	
Cadmium	8.173	0.48	9.615	0.01902	84.8	75-125	8.122	0.625	25	
Calcium	11330	48	961.5	11180	15	75-125	11580	2.18	25	SO
Chromium	12.42	0.48	9.615	3.049	97.5	75-125	12.39	0.232	25	
Cobalt	10.2	0.48	9.615	0.9517	96.2	75-125	10.14	0.567	25	
Copper	8.37	0.48	9.615	0.911	77.6	75-125	8.359	0.138	25	
Iron	3839	48	961.5	2791	109	75-125	3812	0.729	25	
Lead	10.74	0.48	9.615	2.301	87.8	75-125	10.63	0.99	25	
Magnesium	2776	48	961.5	1772	104	75-125	2767	0.312	25	
Manganese	51.03	0.48	9.615	32.92	188	75-125	41.98	19.5	25	S
Molybdenum	8.345	0.48	9.615	0.1188	85.6	75-125	8.088	3.14	25	
Nickel	9.593	0.48	9.615	1.879	80.2	75-125	9.571	0.231	25	
Potassium	1779	48	961.5	809	101	75-125	1777	0.108	25	
Selenium	8.029	0.48	9.615	0.3524	79.8	75-125	8.052	0.287	25	
Silver	8.469	0.48	9.615	0.1002	87	75-125	7.929	6.59	25	
Sodium	1360	48	961.5	453.8	94.2	75-125	1362	0.212	25	
Strontium	54.07	0.48	9.615	43.66	108	75-125	103.2	62.5	25	RO
Thallium	7.699	0.48	9.615	0.0295	79.8	75-125	7.51	2.49	25	
Tin	9.198	2.4	9.615	1.089	84.3	75-125	9.144	0.587	25	
Titanium	86.74	0.48	19.23	65.6	110	75-125	83.28	4.07	25	
Vanadium	22.14	0.48	9.615	12.35	102	75-125	21.8	1.58	25	
Zinc	14.45	0.48	9.615	5.852	89.4	75-125	14.62	1.12	25	

MSD		Sample ID: <b>0802326-06CMSD</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 19:44</b>		
Client ID:		Run ID: <b>ICP7500_080220A</b>				SeqNo: <b>1333846</b>		Prep Date: <b>2/20/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	2885	0.96	9.615	2338	5680	75-125	2900	0.532	25	SEO

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

# QC BATCH REPORT

Batch ID: **28320** Instrument ID **ICP7500** Method: **SW6020**

DUP		Sample ID: <b>0802326-06CDUP</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 19:26</b>		
Client ID:		Run ID: <b>ICP7500_080220A</b>				SeqNo: <b>1331474</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	U	0.48	0	0	0	0-0	0.1028	0	25	
Arsenic	2.794	0.48	0	0	0	0-0	2.707	3.18	25	
Barium	22.76	0.48	0	0	0	0-0	30.04	27.6	25	R
Beryllium	0.1479	0.48	0	0	0	0-0	0.1474	0	25	J
Boron	4.84	2.4	0	0	0	0-0	4.882	0.851	25	
Cadmium	U	0.48	0	0	0	0-0	0.01902	0	25	
Calcium	10590	48	0	0	0	0-0	11180	5.48	25	
Chromium	3.134	0.48	0	0	0	0-0	3.049	2.74	25	
Cobalt	0.9415	0.48	0	0	0	0-0	0.9517	1.08	25	
Copper	0.9185	0.48	0	0	0	0-0	0.911	0.82	25	
Iron	2841	48	0	0	0	0-0	2791	1.78	25	
Lead	2.313	0.48	0	0	0	0-0	2.301	0.542	25	
Magnesium	1836	48	0	0	0	0-0	1772	3.52	25	
Manganese	32.01	0.48	0	0	0	0-0	32.92	2.81	25	
Molybdenum	0.116	0.48	0	0	0	0-0	0.1188	0	25	J
Nickel	1.884	0.48	0	0	0	0-0	1.879	0.256	25	
Potassium	827.8	48	0	0	0	0-0	809	2.29	25	
Selenium	0.3281	0.48	0	0	0	0-0	0.3524	0	25	J
Silver	0.1	0.48	0	0	0	0-0	0.1002	0	25	J
Sodium	467.9	48	0	0	0	0-0	453.8	3.07	25	
Strontium	51.19	0.48	0	0	0	0-0	43.66	15.9	25	
Thallium	U	0.48	0	0	0	0-0	0.0295	0	25	
Tin	1.104	2.4	0	0	0	0-0	1.089	0	25	J
Titanium	68.36	0.48	0	0	0	0-0	65.6	4.12	25	
Vanadium	12.42	0.48	0	0	0	0-0	12.35	0.621	25	
Zinc	6.092	0.48	0	0	0	0-0	5.852	4.03	25	

DUP		Sample ID: <b>0802326-06CDUP</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/21/08 15:08</b>		
Client ID:		Run ID: <b>ICP7500_080221A</b>				SeqNo: <b>1332029</b>		Prep Date: <b>2/20/2008</b>		DF: <b>100</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	2744	96	0	0	0	0-0	2338	16	25	

The following samples were analyzed in this batch:

0802304-01D	0802304-02D	0802304-03D
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ND - Not Detected at the Reporting Limit  
J - Analyte detected below quantitation limits  
O - Referenced analyte value is > 4 times amount spiked  
S - Spike Recovery outside accepted recovery limits  
R - RPD outside accepted recovery limits  
P - Dual Column results percent difference > 40%  
B - Analyte detected in assoc. Method Blank  
U - Analyzed for but not detected  
E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: **28367** Instrument ID **ICP7500** Method: **SW6020**

**MBLK** Sample ID: **MBLKS1-022208** Units: **mg/Kg** Analysis Date: **02/27/08 12:50**

Client ID: Run ID: **ICP7500\_080227A** SeqNo: **1335572** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	U	5.0								

**LCS** Sample ID: **MLCSS1-022208** Units: **mg/Kg** Analysis Date: **02/27/08 12:53**

Client ID: Run ID: **ICP7500\_080227A** SeqNo: **1335573** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	47.04	5.0	50	0	94.1	80-120	0			

**MS** Sample ID: **0802300-05EMS** Units: **mg/Kg** Analysis Date: **02/27/08 13:28**

Client ID: Run ID: **ICP7500\_080227A** SeqNo: **1335584** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	45.29	4.7	47.17	4.044	87.4	80-120	0			

**MSD** Sample ID: **0802300-05EMSD** Units: **mg/Kg** Analysis Date: **02/27/08 13:32**

Client ID: Run ID: **ICP7500\_080227A** SeqNo: **1335585** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	46.21	4.7	47.17	4.044	89.4	80-120	45.29	2	25	

**DUP** Sample ID: **0802300-05EDUP** Units: **mg/Kg** Analysis Date: **02/27/08 13:25**

Client ID: Run ID: **ICP7500\_080227A** SeqNo: **1335583** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	U	4.7	0	0	0		4.044	0		

The following samples were analyzed in this batch:

0802304-01E	0802304-02E	0802304-03E
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ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

# QC BATCH REPORT

Batch ID: **28372** Instrument ID **Mercury** Method: **SW7471A**

<b>MBLK</b>	Sample ID: <b>GBLKS1-022508</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/25/08 14:58</b>		
Client ID:	Run ID: <b>MERCURY_080225A</b>				SeqNo: <b>1334001</b>	Prep Date: <b>2/25/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	U	13								

<b>LCS</b>	Sample ID: <b>GLCSS1-022508</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/25/08 15:00</b>		
Client ID:	Run ID: <b>MERCURY_080225A</b>				SeqNo: <b>1334002</b>	Prep Date: <b>2/25/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	347.3	13	333.3	0	104	85-115	0			

<b>LCSD</b>	Sample ID: <b>GLCSDS1-022508</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/25/08 15:02</b>		
Client ID:	Run ID: <b>MERCURY_080225A</b>				SeqNo: <b>1334003</b>	Prep Date: <b>2/25/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	344.7	13	333.3	0	103	85-115	347.3	0.771	20	

<b>MS</b>	Sample ID: <b>0802300-01CMS</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/25/08 15:16</b>		
Client ID:	Run ID: <b>MERCURY_080225A</b>				SeqNo: <b>1334006</b>	Prep Date: <b>2/25/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	329.9	13	330.6	9.451	96.9	85-115	0			

<b>MSD</b>	Sample ID: <b>0802300-01CMSD</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/25/08 15:18</b>		
Client ID:	Run ID: <b>MERCURY_080225A</b>				SeqNo: <b>1334007</b>	Prep Date: <b>2/25/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	335.1	13	331.1	9.451	98.3	85-115	329.9	1.56	20	

<b>DUP</b>	Sample ID: <b>0802300-01CDUP</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/25/08 15:14</b>		
Client ID:	Run ID: <b>MERCURY_080225A</b>				SeqNo: <b>1334005</b>	Prep Date: <b>2/25/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	9.455	13	0	0	0		9.451	0	20	J

The following samples were analyzed in this batch:

0802304-01D	0802304-02D	0802304-03D
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ND - Not Detected at the Reporting Limit	S - Spike Recovery outside accepted recovery limits	B - Analyte detected in assoc. Method Blank
J - Analyte detected below quantitation limits	R - RPD outside accepted recovery limits	U - Analyzed for but not detected
O - Referenced analyte value is > 4 times amount spiked	P - Dual Column results percent difference > 40%	E - Value above quantitation range



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

# QC BATCH REPORT

Batch ID: **28295** Instrument ID **SV-4** Method: **SW8270**

**MBLK** Sample ID: **SBLKS1-080219** Units: **µg/Kg** Analysis Date: **02/20/08 16:31**  
 Client ID: Run ID: **SV-4\_080220A** SeqNo: **1332654** Prep Date: **2/19/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	U	6.6								
2,4,5-Trichlorophenol	U	6.6								
2,4,6-Trichlorophenol	U	6.6								
2,4-Dichlorophenol	U	6.6								
2,4-Dimethylphenol	U	6.6								
2,4-Dinitrophenol	U	33								
2,4-Dinitrotoluene	U	6.6								
2,6-Dinitrotoluene	U	6.6								
2-Chloronaphthalene	U	6.6								
2-Chlorophenol	U	6.6								
2-Methylnaphthalene	U	6.6								
2-Methylphenol	U	6.6								
2-Nitroaniline	U	6.6								
2-Nitrophenol	U	6.6								
3&4-Methylphenol	U	6.6								
3,3'-Dichlorobenzidine	U	6.6								
3-Nitroaniline	U	6.6								
4,6-Dinitro-2-methylphenol	U	6.6								
4-Bromophenyl phenyl ether	U	6.6								
4-Chloro-3-methylphenol	U	6.6								
4-Chloroaniline	U	6.6								
4-Chlorophenyl phenyl ether	U	6.6								
4-Nitroaniline	U	6.6								
4-Nitrophenol	U	33								
Acenaphthene	U	6.6								
Acenaphthylene	U	6.6								
Acetophenone	U	6.6								
Anthracene	U	6.6								
Atrazine	U	6.6								
Benz(a)anthracene	U	6.6								
Benzaldehyde	U	6.6								
Benzo(a)pyrene	U	6.6								
Benzo(b)fluoranthene	U	6.6								
Benzo(g,h,i)perylene	U	6.6								
Benzo(k)fluoranthene	U	6.6								
Bis(2-chloroethoxy)methane	U	6.6								
Bis(2-chloroethyl)ether	U	6.6								
Bis(2-chloroisopropyl)ether	U	6.6								
Bis(2-ethylhexyl)phthalate	U	6.6								
Butyl benzyl phthalate	U	6.6								

ND - Not Detected at the Reporting Limit S - Spike Recovery outside accepted recovery limits B - Analyte detected in assoc. Method Blank  
 J - Analyte detected below quantitation limits R - RPD outside accepted recovery limits U - Analyzed for but not detected  
 O - Referenced analyte value is > 4 times amount spiked P - Dual Column results percent difference > 40% E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: <b>28295</b>		Instrument ID <b>SV-4</b>		Method: <b>SW8270</b>				
Caprolactam	U	6.6						
Carbazole	U	6.6						
Chrysene	U	6.6						
Di-n-butyl phthalate	U	6.6						
Di-n-octyl phthalate	U	6.6						
Dibenz(a,h)anthracene	U	6.6						
Dibenzofuran	U	6.6						
Diethyl phthalate	U	6.6						
Dimethyl phthalate	U	6.6						
Fluoranthene	U	6.6						
Fluorene	U	6.6						
Hexachlorobenzene	U	6.6						
Hexachlorobutadiene	U	6.6						
Hexachlorocyclopentadiene	U	6.6						
Hexachloroethane	U	6.6						
Indeno(1,2,3-cd)pyrene	U	6.6						
Isophorone	U	6.6						
N-Nitrosodi-n-propylamine	U	6.6						
N-Nitrosodiphenylamine	U	6.6						
Naphthalene	U	6.6						
Nitrobenzene	U	6.6						
Pentachlorophenol	U	6.6						
Phenanthrene	U	6.6						
Phenol	U	6.6						
Pyrene	U	6.6						
<i>Surr: 2,4,6-Tribromophenol</i>	<i>145.8</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>87.5</i>	<i>36-126</i>	<i>0</i>	
<i>Surr: 2-Fluorobiphenyl</i>	<i>147.9</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>88.7</i>	<i>43-125</i>	<i>0</i>	
<i>Surr: 2-Fluorophenol</i>	<i>160.6</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>96.4</i>	<i>37-125</i>	<i>0</i>	
<i>Surr: 4-Terphenyl-d14</i>	<i>160.6</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>96.4</i>	<i>32-125</i>	<i>0</i>	
<i>Surr: Nitrobenzene-d5</i>	<i>135.8</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>81.5</i>	<i>37-125</i>	<i>0</i>	
<i>Surr: Phenol-d6</i>	<i>150.7</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>90.4</i>	<i>40-125</i>	<i>0</i>	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 17 of 35

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

# QC BATCH REPORT

Batch ID: **28295** Instrument ID **SV-4** Method: **SW8270**

LCS		Sample ID: <b>SLCSS1-080219</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/20/08 16:53</b>		
Client ID:		Run ID: <b>SV-4_080220A</b>				SeqNo: <b>1332655</b>		Prep Date: <b>2/19/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	135.4	6.6	166.7	0	81.2	40-140	0			
2,4,5-Trichlorophenol	156.4	6.6	166.7	0	93.8	40-140	0			
2,4,6-Trichlorophenol	153.1	6.6	166.7	0	91.9	40-140	0			
2,4-Dichlorophenol	141.8	6.6	166.7	0	85.1	40-140	0			
2,4-Dimethylphenol	163.9	6.6	166.7	0	98.3	40-140	0			
2,4-Dinitrophenol	124.6	33	166.7	0	74.7	40-140	0			
2,4-Dinitrotoluene	150.5	6.6	166.7	0	90.3	40-140	0			
2,6-Dinitrotoluene	154	6.6	166.7	0	92.4	40-140	0			
2-Chloronaphthalene	173.7	6.6	166.7	0	104	40-140	0			
2-Chlorophenol	151.9	6.6	166.7	0	91.1	40-140	0			
2-Methylnaphthalene	142.6	6.6	166.7	0	85.6	43-116	0			
2-Methylphenol	144.9	6.6	166.7	0	86.9	41-115	0			
2-Nitroaniline	140.6	6.6	166.7	0	84.4	40-140	0			
2-Nitrophenol	147.3	6.6	166.7	0	88.4	40-140	0			
3&4-Methylphenol	146.6	6.6	166.7	0	88	40-140	0			
3,3'-Dichlorobenzidine	118.4	6.6	166.7	0	71	40-140	0			
3-Nitroaniline	128.5	6.6	166.7	0	77.1	40-140	0			
4,6-Dinitro-2-methylphenol	140.7	6.6	166.7	0	84.4	40-140	0			
4-Bromophenyl phenyl ether	144.6	6.6	166.7	0	86.8	52-115	0			
4-Chloro-3-methylphenol	159.6	6.6	166.7	0	95.7	40-140	0			
4-Chloroaniline	98.47	6.6	166.7	0	59.1	40-140	0			
4-Chlorophenyl phenyl ether	146.8	6.6	166.7	0	88.1	49-115	0			
4-Nitroaniline	143.5	6.6	166.7	0	86.1	40-140	0			
4-Nitrophenol	159.5	33	166.7	0	95.7	40-140	0			
Acenaphthene	139.3	6.6	166.7	0	83.6	51-115	0			
Acenaphthylene	133.3	6.6	166.7	0	80	51-115	0			
Acetophenone	145.9	6.6	166.7	0	87.6	40-140	0			
Anthracene	142.3	6.6	166.7	0	85.4	55-115	0			
Atrazine	158.4	6.6	166.7	0	95	40-140	0			
Benz(a)anthracene	166.8	6.6	166.7	0	100	48-118	0			
Benzaldehyde	114.6	6.6	166.7	0	68.8	40-140	0			
Benzo(a)pyrene	162.1	6.6	166.7	0	97.3	46-120	0			
Benzo(b)fluoranthene	179.3	6.6	166.7	0	108	42-120	0			
Benzo(g,h,i)perylene	152.9	6.6	166.7	0	91.7	37-132	0			
Benzo(k)fluoranthene	170.5	6.6	166.7	0	102	36-131	0			
Bis(2-chloroethoxy)methane	142.5	6.6	166.7	0	85.5	40-140	0			
Bis(2-chloroethyl)ether	105	6.6	166.7	0	63	40-140	0			
Bis(2-chloroisopropyl)ether	138.7	6.6	166.7	0	83.2	40-140	0			
Bis(2-ethylhexyl)phthalate	159.4	6.6	166.7	0	95.6	38-145	0			
Butyl benzyl phthalate	155.9	6.6	166.7	0	93.5	40-140	0			

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: <b>28295</b>	Instrument ID <b>SV-4</b>		Method: <b>SW8270</b>					
Caprolactam	132.3	6.6	166.7	0	79.4	40-140	0	
Carbazole	151.2	6.6	166.7	0	90.7	35-137	0	
Chrysene	165.7	6.6	166.7	0	99.4	52-118	0	
Di-n-butyl phthalate	151.8	6.6	166.7	0	91.1	40-140	0	
Di-n-octyl phthalate	149.7	6.6	166.7	0	89.8	40-140	0	
Dibenz(a,h)anthracene	158.6	6.6	166.7	0	95.2	35-133	0	
Dibenzofuran	146.8	6.6	166.7	0	88.1	55-115	0	
Diethyl phthalate	131.7	6.6	166.7	0	79	40-140	0	
Dimethyl phthalate	139.7	6.6	166.7	0	83.8	40-140	0	
Fluoranthene	151.2	6.6	166.7	0	90.7	55-117	0	
Fluorene	140	6.6	166.7	0	84	52-115	0	
Hexachlorobenzene	144.2	6.6	166.7	0	86.5	49-115	0	
Hexachlorobutadiene	148.7	6.6	166.7	0	89.2	40-140	0	
Hexachlorocyclopentadiene	141.1	6.6	166.7	0	84.6	40-140	0	
Hexachloroethane	122.6	6.6	166.7	0	73.6	40-140	0	
Indeno(1,2,3-cd)pyrene	154.6	6.6	166.7	0	92.7	35-133	0	
Isophorone	132	6.6	166.7	0	79.2	40-140	0	
N-Nitrosodi-n-propylamine	141	6.6	166.7	0	84.6	40-140	0	
N-Nitrosodiphenylamine	145.4	6.6	166.7	0	87.2	40-140	0	
Naphthalene	142.1	6.6	166.7	0	85.3	50-115	0	
Nitrobenzene	131.3	6.6	166.7	0	78.8	40-140	0	
Pentachlorophenol	166.5	6.6	166.7	0	99.9	20-145	0	
Phenanthrene	145.2	6.6	166.7	0	87.1	51-115	0	
Phenol	146.2	6.6	166.7	0	87.7	10-110	0	
Pyrene	152.9	6.6	166.7	0	91.7	52-115	0	
<i>Surr: 2,4,6-Tribromophenol</i>	<i>134.6</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>80.8</i>	<i>36-126</i>	<i>0</i>	
<i>Surr: 2-Fluorobiphenyl</i>	<i>137.4</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>82.5</i>	<i>43-125</i>	<i>0</i>	
<i>Surr: 2-Fluorophenol</i>	<i>137.9</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>82.7</i>	<i>37-125</i>	<i>0</i>	
<i>Surr: 4-Terphenyl-d14</i>	<i>162.1</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>97.3</i>	<i>32-125</i>	<i>0</i>	
<i>Surr: Nitrobenzene-d5</i>	<i>138.1</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>82.8</i>	<i>37-125</i>	<i>0</i>	
<i>Surr: Phenol-d6</i>	<i>150.7</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>90.4</i>	<i>40-125</i>	<i>0</i>	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

# QC BATCH REPORT

Batch ID: **28295** Instrument ID **SV-4** Method: **SW8270**

MS				Sample ID: <b>0802300-03CMS</b>			Units: <b>µg/Kg</b>		Analysis Date: <b>02/21/08 14:58</b>	
Client ID:				Run ID: <b>SV-4_080220A</b>			SeqNo: <b>1332659</b>		Prep Date: <b>2/19/2008</b>	
									DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	136.4	6.6	166.4	0	81.9	40-140	0			
2,4,5-Trichlorophenol	148.6	6.6	166.4	0	89.3	40-140	0			
2,4,6-Trichlorophenol	146.8	6.6	166.4	0	88.2	40-140	0			
2,4-Dichlorophenol	148.1	6.6	166.4	0	89	40-140	0			
2,4-Dimethylphenol	142.5	6.6	166.4	0	85.7	40-140	0			
2,4-Dinitrophenol	72.52	33	166.4	0	43.6	40-140	0			
2,4-Dinitrotoluene	148.3	6.6	166.4	0	89.1	40-140	0			
2,6-Dinitrotoluene	157.6	6.6	166.4	0	94.7	40-140	0			
2-Chloronaphthalene	166.9	6.6	166.4	0	100	40-140	0			
2-Chlorophenol	160.6	6.6	166.4	0	96.5	40-140	0			
2-Methylnaphthalene	145.7	6.6	166.4	0	87.5	43-116	0			
2-Methylphenol	139.9	6.6	166.4	0	84.1	41-115	0			
2-Nitroaniline	126.6	6.6	166.4	0	76.1	40-140	0			
2-Nitrophenol	139.9	6.6	166.4	0	84.1	40-140	0			
3&4-Methylphenol	149.5	6.6	166.4	0	89.8	40-140	0			
3,3'-Dichlorobenzidine	125.2	6.6	166.4	0	75.2	40-140	0			
3-Nitroaniline	118.6	6.6	166.4	0	71.3	40-140	0			
4,6-Dinitro-2-methylphenol	81.11	6.6	166.4	0	48.7	40-140	0			
4-Bromophenyl phenyl ether	137.6	6.6	166.4	0	82.7	52-115	0			
4-Chloro-3-methylphenol	162.3	6.6	166.4	0	97.5	40-140	0			
4-Chloroaniline	101.8	6.6	166.4	0	61.2	40-140	0			
4-Chlorophenyl phenyl ether	149.3	6.6	166.4	0	89.7	49-115	0			
4-Nitroaniline	130.4	6.6	166.4	0	78.4	40-140	0			
4-Nitrophenol	169.5	33	166.4	0	102	40-140	0			
Acenaphthene	140.9	6.6	166.4	0	84.7	51-115	0			
Acenaphthylene	131.8	6.6	166.4	0	79.2	51-115	0			
Acetophenone	145.1	6.6	166.4	0	87.2	40-140	0			
Anthracene	139.9	6.6	166.4	0	84.1	55-115	0			
Atrazine	159	6.6	166.4	0	95.5	40-140	0			
Benz(a)anthracene	173.6	6.6	166.4	0	104	48-118	0			
Benzaldehyde	121.7	6.6	166.4	0	73.1	40-140	0			
Benzo(a)pyrene	171.1	6.6	166.4	0	103	46-120	0			
Benzo(b)fluoranthene	169.9	6.6	166.4	0	102	42-120	0			
Benzo(g,h,i)perylene	158.7	6.6	166.4	0	95.4	37-132	0			
Benzo(k)fluoranthene	157.3	6.6	166.4	0	94.6	36-131	0			
Bis(2-chloroethoxy)methane	140.8	6.6	166.4	0	84.6	40-140	0			
Bis(2-chloroethyl)ether	126.7	6.6	166.4	0	76.1	40-140	0			
Bis(2-chloroisopropyl)ether	122	6.6	166.4	0	73.3	40-140	0			
Bis(2-ethylhexyl)phthalate	180.4	6.6	166.4	14.18	99.9	38-145	0			
Butyl benzyl phthalate	178.2	6.6	166.4	0	107	40-140	0			

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U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: <b>28295</b>	Instrument ID <b>SV-4</b>		Method: <b>SW8270</b>				
Caprolactam	179.2	6.6	166.4	24.84	92.8	40-140	0
Carbazole	148.5	6.6	166.4	0	89.2	35-137	0
Chrysene	165.7	6.6	166.4	0	99.6	52-118	0
Di-n-butyl phthalate	152.1	6.6	166.4	10.79	84.9	40-140	0
Di-n-octyl phthalate	169.9	6.6	166.4	0	102	40-140	0
Dibenz(a,h)anthracene	165.7	6.6	166.4	0	99.6	35-133	0
Dibenzofuran	137.7	6.6	166.4	0	82.8	55-115	0
Diethyl phthalate	135.9	6.6	166.4	0	81.6	40-140	0
Dimethyl phthalate	146.5	6.6	166.4	0	88.1	40-140	0
Fluoranthene	143.7	6.6	166.4	0	86.4	55-117	0
Fluorene	137.6	6.6	166.4	0	82.7	52-115	0
Hexachlorobenzene	136.5	6.6	166.4	0	82	49-115	0
Hexachlorobutadiene	139.5	6.6	166.4	0	83.8	40-140	0
Hexachlorocyclopentadiene	76.72	6.6	166.4	0	46.1	40-140	0
Hexachloroethane	113.4	6.6	166.4	0	68.2	40-140	0
Indeno(1,2,3-cd)pyrene	159.3	6.6	166.4	0	95.7	35-133	0
Isophorone	136	6.6	166.4	0	81.7	40-140	0
N-Nitrosodi-n-propylamine	134.9	6.6	166.4	0	81.1	40-140	0
N-Nitrosodiphenylamine	149.6	6.6	166.4	0	89.9	40-140	0
Naphthalene	133.2	6.6	166.4	0	80	50-115	0
Nitrobenzene	126.7	6.6	166.4	0	76.2	40-140	0
Pentachlorophenol	149.6	6.6	166.4	0	89.9	20-145	0
Phenanthrene	144.4	6.6	166.4	0	86.8	51-115	0
Phenol	149.6	6.6	166.4	0	89.9	10-110	0
Pyrene	167.9	6.6	166.4	0	101	52-115	0
<i>Surr: 2,4,6-Tribromophenol</i>	<i>118.9</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>71.4</i>	<i>36-126</i>	<i>0</i>
<i>Surr: 2-Fluorobiphenyl</i>	<i>130.9</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>78.7</i>	<i>43-125</i>	<i>0</i>
<i>Surr: 2-Fluorophenol</i>	<i>134.2</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>80.6</i>	<i>37-125</i>	<i>0</i>
<i>Surr: 4-Terphenyl-d14</i>	<i>171.5</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>103</i>	<i>32-125</i>	<i>0</i>
<i>Surr: Nitrobenzene-d5</i>	<i>135.5</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>81.5</i>	<i>37-125</i>	<i>0</i>
<i>Surr: Phenol-d6</i>	<i>145.3</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>87.3</i>	<i>40-125</i>	<i>0</i>

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R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

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U - Analyzed for but not detected

E - Value above quantitation range



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

# QC BATCH REPORT

Batch ID: **28295** Instrument ID **SV-4** Method: **SW8270**

MSD		Sample ID: <b>0802300-03CMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/21/08 15:19</b>		
Client ID:		Run ID: <b>SV-4_080220A</b>				SeqNo: <b>1332661</b>		Prep Date: <b>2/19/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	139.9	6.6	166.6	0	84	40-140	136.4	2.53	30	
2,4,5-Trichlorophenol	147.8	6.6	166.6	0	88.8	40-140	148.6	0.49	30	
2,4,6-Trichlorophenol	152	6.6	166.6	0	91.2	40-140	146.8	3.48	30	
2,4-Dichlorophenol	149.5	6.6	166.6	0	89.8	40-140	148.1	0.947	30	
2,4-Dimethylphenol	141.6	6.6	166.6	0	85	40-140	142.5	0.654	30	
2,4-Dinitrophenol	95.3	33	166.6	0	57.2	40-140	72.52	27.1	30	
2,4-Dinitrotoluene	146	6.6	166.6	0	87.7	40-140	148.3	1.54	30	
2,6-Dinitrotoluene	156.1	6.6	166.6	0	93.7	40-140	157.6	0.961	30	
2-Chloronaphthalene	167.2	6.6	166.6	0	100	40-140	166.9	0.171	30	
2-Chlorophenol	151.7	6.6	166.6	0	91.1	40-140	160.6	5.67	30	
2-Methylnaphthalene	139	6.6	166.6	0	83.5	43-116	145.7	4.68	30	
2-Methylphenol	141.7	6.6	166.6	0	85.1	41-115	139.9	1.26	30	
2-Nitroaniline	139.5	6.6	166.6	0	83.7	40-140	126.6	9.65	30	
2-Nitrophenol	137.3	6.6	166.6	0	82.4	40-140	139.9	1.87	30	
3&4-Methylphenol	153.6	6.6	166.6	0	92.2	40-140	149.5	2.7	30	
3,3'-Dichlorobenzidine	122.9	6.6	166.6	0	73.8	40-140	125.2	1.89	30	
3-Nitroaniline	124.7	6.6	166.6	0	74.9	40-140	118.6	5.01	30	
4,6-Dinitro-2-methylphenol	95.28	6.6	166.6	0	57.2	40-140	81.11	16.1	30	
4-Bromophenyl phenyl ether	138.8	6.6	166.6	0	83.4	52-115	137.6	0.907	30	
4-Chloro-3-methylphenol	164.6	6.6	166.6	0	98.8	40-140	162.3	1.41	30	
4-Chloroaniline	96.86	6.6	166.6	0	58.2	40-140	101.8	5.02	30	
4-Chlorophenyl phenyl ether	154.6	6.6	166.6	0	92.8	49-115	149.3	3.46	30	
4-Nitroaniline	140.1	6.6	166.6	0	84.1	40-140	130.4	7.13	30	
4-Nitrophenol	156.8	33	166.6	0	94.1	40-140	169.5	7.76	30	
Acenaphthene	145.1	6.6	166.6	0	87.1	51-115	140.9	2.99	30	
Acenaphthylene	134.7	6.6	166.6	0	80.8	51-115	131.8	2.17	30	
Acetophenone	134.5	6.6	166.6	0	80.7	40-140	145.1	7.61	30	
Anthracene	126.5	6.6	166.6	0	75.9	55-115	139.9	10.1	30	
Atrazine	155.6	6.6	166.6	0	93.4	40-140	159	2.14	30	
Benz(a)anthracene	158	6.6	166.6	0	94.9	48-118	173.6	9.44	30	
Benzaldehyde	119.6	6.6	166.6	0	71.8	40-140	121.7	1.7	30	
Benzo(a)pyrene	171.2	6.6	166.6	0	103	46-120	171.1	0.0272	30	
Benzo(b)fluoranthene	176.9	6.6	166.6	0	106	42-120	169.9	4.03	30	
Benzo(g,h,i)perylene	156.7	6.6	166.6	0	94.1	37-132	158.7	1.3	30	
Benzo(k)fluoranthene	161.9	6.6	166.6	0	97.2	36-131	157.3	2.88	30	
Bis(2-chloroethoxy)methane	132.8	6.6	166.6	0	79.8	40-140	140.8	5.84	30	
Bis(2-chloroethyl)ether	126	6.6	166.6	0	75.6	40-140	126.7	0.586	30	
Bis(2-chloroisopropyl)ether	121.9	6.6	166.6	0	73.2	40-140	122	0.0951	30	
Bis(2-ethylhexyl)phthalate	178.4	6.6	166.6	14.18	98.6	38-145	180.4	1.11	30	
Butyl benzyl phthalate	161	6.6	166.6	0	96.6	40-140	178.2	10.2	30	

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U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: <b>28295</b>		Instrument ID <b>SV-4</b>		Method: <b>SW8270</b>					
Caprolactam	208	6.6	166.6	24.84	110	40-140	179.2	14.9	30
Carbazole	143.5	6.6	166.6	0	86.1	35-137	148.5	3.44	30
Chrysene	155.1	6.6	166.6	0	93.1	52-118	165.7	6.62	30
Di-n-butyl phthalate	152.9	6.6	166.6	10.79	85.3	40-140	152.1	0.479	30
Di-n-octyl phthalate	180.5	6.6	166.6	0	108	40-140	169.9	6.04	30
Dibenz(a,h)anthracene	160.5	6.6	166.6	0	96.4	35-133	165.7	3.14	30
Dibenzofuran	145.5	6.6	166.6	0	87.4	55-115	137.7	5.52	30
Diethyl phthalate	145.1	6.6	166.6	0	87.1	40-140	135.9	6.57	30
Dimethyl phthalate	149.2	6.6	166.6	0	89.6	40-140	146.5	1.85	30
Fluoranthene	140.9	6.6	166.6	0	84.6	55-117	143.7	1.94	30
Fluorene	145	6.6	166.6	0	87	52-115	137.6	5.24	30
Hexachlorobenzene	135.8	6.6	166.6	0	81.5	49-115	136.5	0.506	30
Hexachlorobutadiene	128.8	6.6	166.6	0	77.3	40-140	139.5	7.99	30
Hexachlorocyclopentadiene	81.01	6.6	166.6	0	48.6	40-140	76.72	5.45	30
Hexachloroethane	121.1	6.6	166.6	0	72.7	40-140	113.4	6.53	30
Indeno(1,2,3-cd)pyrene	167.1	6.6	166.6	0	100	35-133	159.3	4.78	30
Isophorone	128.4	6.6	166.6	0	77.1	40-140	136	5.7	30
N-Nitrosodi-n-propylamine	139.2	6.6	166.6	0	83.6	40-140	134.9	3.13	30
N-Nitrosodiphenylamine	149.2	6.6	166.6	0	89.6	40-140	149.6	0.315	30
Naphthalene	130.2	6.6	166.6	0	78.2	50-115	133.2	2.25	30
Nitrobenzene	131.5	6.6	166.6	0	78.9	40-140	126.7	3.65	30
Pentachlorophenol	106.2	6.6	166.6	0	63.7	20-145	149.6	34	30 R
Phenanthrene	154.6	6.6	166.6	0	92.8	51-115	144.4	6.8	30
Phenol	153.3	6.6	166.6	0	92	10-110	149.6	2.43	30
Pyrene	152.2	6.6	166.6	0	91.4	52-115	167.9	9.81	30
<i>Surr: 2,4,6-Tribromophenol</i>	131.3	6.6	166.6	0	78.8	36-126	118.9	9.95	30
<i>Surr: 2-Fluorobiphenyl</i>	135.3	6.6	166.6	0	81.2	43-125	130.9	3.32	30
<i>Surr: 2-Fluorophenol</i>	136.2	6.6	166.6	0	81.8	37-125	134.2	1.49	30
<i>Surr: 4-Terphenyl-d14</i>	160.5	6.6	166.6	0	96.4	32-125	171.5	6.62	30
<i>Surr: Nitrobenzene-d5</i>	120.4	6.6	166.6	0	72.3	37-125	135.5	11.8	30
<i>Surr: Phenol-d6</i>	145.7	6.6	166.6	0	87.4	40-125	145.3	0.235	30

The following samples were analyzed in this batch:

0802304-01C	0802304-02C	0802304-03C
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**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

# QC BATCH REPORT

Batch ID: **R60280** Instrument ID **VOA3** Method: **SW8260**

**MBLK** Sample ID: **VBLKS-022508** Units: **µg/Kg** Analysis Date: **02/25/08 13:48**  
 Client ID: Run ID: **VOA3\_080225A** SeqNo: **1334671** Prep Date: DF: 1

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	U	5.0								
1,1,2,2-Tetrachloroethane	U	5.0								
1,1,2-Trichlor-1,2,2-trifluoroethane	U	5.0								
1,1,2-Trichloroethane	U	5.0								
1,1-Dichloroethane	U	5.0								
1,1-Dichloroethene	U	5.0								
1,2,4-Trichlorobenzene	U	5.0								
1,2-Dibromo-3-chloropropane	U	5.0								
1,2-Dibromoethane	U	5.0								
1,2-Dichlorobenzene	U	5.0								
1,2-Dichloroethane	U	5.0								
1,2-Dichloropropane	U	5.0								
1,3-Dichlorobenzene	U	5.0								
1,4-Dichlorobenzene	U	5.0								
2-Butanone	U	10								
2-Hexanone	U	10								
4-Methyl-2-pentanone	U	10								
Acetone	U	20								
Benzene	U	5.0								
Bromodichloromethane	U	5.0								
Bromoform	U	5.0								
Bromomethane	U	10								
Carbon disulfide	U	10								
Carbon tetrachloride	U	5.0								
Chlorobenzene	U	5.0								
Chloroethane	U	10								
Chloroform	U	5.0								
Chloromethane	U	10								
cis-1,2-Dichloroethene	U	5.0								
cis-1,3-Dichloropropene	U	5.0								
Cyclohexane	U	5.0								
Dibromochloromethane	U	5.0								
Dichlorodifluoromethane	U	5.0								
Ethylbenzene	U	5.0								
Isopropylbenzene	U	5.0								
Methyl acetate	U	5.0								
Methyl tert-butyl ether	U	5.0								
Methylcyclohexane	U	5.0								
Styrene	U	5.0								
Tetrachloroethene	U	5.0								

ND - Not Detected at the Reporting Limit S - Spike Recovery outside accepted recovery limits B - Analyte detected in assoc. Method Blank  
 J - Analyte detected below quantitation limits R - RPD outside accepted recovery limits U - Analyzed for but not detected  
 O - Referenced analyte value is > 4 times amount spiked P - Dual Column results percent difference > 40% E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: <b>R60280</b>	Instrument ID <b>VOA3</b>	Method: <b>SW8260</b>
Toluene	U	5.0
trans-1,2-Dichloroethene	U	5.0
trans-1,3-Dichloropropene	U	5.0
Trichloroethene	U	5.0
Trichlorofluoromethane	U	5.0
Vinyl chloride	U	2.0
Xylenes, Total	U	15
<i>Surr: 1,2-Dichloroethane-d4</i>	<i>53.37</i>	<i>0 50 0 107 70-128 0</i>
<i>Surr: 4-Bromofluorobenzene</i>	<i>54.52</i>	<i>0 50 0 109 73-126 0</i>
<i>Surr: Dibromofluoromethane</i>	<i>52.99</i>	<i>0 50 0 106 71-128 0</i>
<i>Surr: Toluene-d8</i>	<i>53.78</i>	<i>0 50 0 108 73-127 0</i>

ND - Not Detected at the Reporting Limit	S - Spike Recovery outside accepted recovery limits	B - Analyte detected in assoc. Method Blank
J - Analyte detected below quantitation limits	R - RPD outside accepted recovery limits	U - Analyzed for but not detected
O - Referenced analyte value is > 4 times amount spiked	P - Dual Column results percent difference > 40%	E - Value above quantitation range

QC Page: 25 of 35

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

# QC BATCH REPORT

Batch ID: **R60280** Instrument ID **VOA3** Method: **SW8260**

LCS		Sample ID: <b>VLCSS-022508</b>		Units: <b>µg/Kg</b>		Analysis Date: <b>02/25/08 12:53</b>				
Client ID:		Run ID: <b>VOA3_080225A</b>		SeqNo: <b>1334670</b>		Prep Date:		DF: 1		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	50.93	5.0	50	0	102	79-124	0			
1,1,2,2-Tetrachloroethane	49.74	5.0	50	0	99.5	75-123	0			
1,1,2-Trichlor-1,2,2-trifluoroethane	53.62	5.0	50	0	107	79-125	0			
1,1,2-Trichloroethane	48.11	5.0	50	0	96.2	79-120	0			
1,1-Dichloroethane	49.4	5.0	50	0	98.8	75-124	0			
1,1-Dichloroethene	53.02	5.0	50	0	106	80-122	0			
1,2,4-Trichlorobenzene	49.77	5.0	50	0	99.5	74-128	0			
1,2-Dibromo-3-chloropropane	46.69	5.0	50	0	93.4	66-129	0			
1,2-Dibromoethane	47.1	5.0	50	0	94.2	79-120	0			
1,2-Dichlorobenzene	48.35	5.0	50	0	96.7	79-120	0			
1,2-Dichloroethane	48.42	5.0	50	0	96.8	73-121	0			
1,2-Dichloropropane	49.09	5.0	50	0	98.2	76-120	0			
1,3-Dichlorobenzene	49.85	5.0	50	0	99.7	79-120	0			
1,4-Dichlorobenzene	49.95	5.0	50	0	99.9	77-120	0			
2-Butanone	91.37	10	100	0	91.4	65-130	0			
2-Hexanone	93.93	10	100	0	93.9	65-133	0			
4-Methyl-2-pentanone	91	10	100	0	91	69-130	0			
Acetone	94.56	20	100	0	94.6	53-142	0			
Benzene	48.88	5.0	50	0	97.8	79-120	0			
Bromodichloromethane	49.43	5.0	50	0	98.9	79-121	0			
Bromoform	47.48	5.0	50	0	95	74-122	0			
Bromomethane	45.86	10	50	0	91.7	68-131	0			
Carbon disulfide	101.9	10	100	0	102	80-124	0			
Carbon tetrachloride	49.39	5.0	50	0	98.8	74-126	0			
Chlorobenzene	47.66	5.0	50	0	95.3	79-120	0			
Chloroethane	52.96	10	50	0	106	76-126	0			
Chloroform	49.76	5.0	50	0	99.5	78-120	0			
Chloromethane	47.7	10	50	0	95.4	69-129	0			
cis-1,2-Dichloroethene	49.4	5.0	50	0	98.8	80-120	0			
cis-1,3-Dichloropropene	49.65	5.0	50	0	99.3	77-123	0			
Cyclohexane	54.83	5.0	50	0	110	74-126	0			
Dibromochloromethane	47.89	5.0	50	0	95.8	78-122	0			
Dichlorodifluoromethane	51.1	5.0	50	0	102	57-140	0			
Ethylbenzene	48.54	5.0	50	0	97.1	80-122	0			
Isopropylbenzene	49.87	5.0	50	0	99.7	72-127	0			
Methyl acetate	45.32	5.0	50	0	90.6	69-123	0			
Methyl tert-butyl ether	47.18	5.0	50	0	94.4	76-121	0			
Methylcyclohexane	53.78	5.0	50	0	108	77-126	0			
Styrene	50.78	5.0	50	0	102	78-124	0			
Tetrachloroethene	50.61	5.0	50	0	101	80-121	0			

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: <b>R60280</b>		Instrument ID <b>VOA3</b>		Method: <b>SW8260</b>			
Toluene	48.64	5.0	50	0	97.3	79-120	0
trans-1,2-Dichloroethene	50.59	5.0	50	0	101	79-122	0
trans-1,3-Dichloropropene	49.2	5.0	50	0	98.4	77-120	0
Trichloroethene	48.42	5.0	50	0	96.8	80-121	0
Trichlorofluoromethane	53.31	5.0	50	0	107	75-126	0
Vinyl chloride	53.24	2.0	50	0	106	76-126	0
Xylenes, Total	148.2	15	150	0	98.8	80-120	0
<i>Surr: 1,2-Dichloroethane-d4</i>	46.91	0	50	0	93.8	70-128	0
<i>Surr: 4-Bromofluorobenzene</i>	47.46	0	50	0	94.9	73-126	0
<i>Surr: Dibromofluoromethane</i>	46.64	0	50	0	93.3	71-128	0
<i>Surr: Toluene-d8</i>	46	0	50	0	92	73-127	0

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 27 of 35



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

# QC BATCH REPORT

Batch ID: **R60280** Instrument ID **VOA3** Method: **SW8260**

MS Sample ID: <b>0802304-01BMS</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/25/08 15:09</b>			
Client ID: <b>F14-SB-7 (0-1)</b>		Run ID: <b>VOA3_080225A</b>		SeqNo: <b>1334673</b>		Prep Date:		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	46.12	5.0	50	0	92.2	79-124	0			
1,1,2,2-Tetrachloroethane	44.29	5.0	50	0	88.6	75-123	0			
1,1,2-Trichlor-1,2,2-trifluoroethane	48.62	5.0	50	0	97.2	79-125	0			
1,1,2-Trichloroethane	45.93	5.0	50	0	91.9	79-120	0			
1,1-Dichloroethane	44.06	5.0	50	0	88.1	75-124	0			
1,1-Dichloroethene	48.08	5.0	50	0	96.2	80-122	0			
1,2,4-Trichlorobenzene	41.4	5.0	50	0	82.8	74-128	0			
1,2-Dibromo-3-chloropropane	46.65	5.0	50	0	93.3	66-129	0			
1,2-Dibromoethane	46.23	5.0	50	0	92.5	79-120	0			
1,2-Dichlorobenzene	41.85	5.0	50	0	83.7	79-120	0			
1,2-Dichloroethane	45.21	5.0	50	0	90.4	73-121	0			
1,2-Dichloropropane	45.05	5.0	50	0	90.1	76-120	0			
1,3-Dichlorobenzene	42.83	5.0	50	0	85.7	79-120	0			
1,4-Dichlorobenzene	42.58	5.0	50	0	85.2	77-120	0			
2-Butanone	91.1	10	100	0	91.1	65-130	0			
2-Hexanone	97.38	10	100	0	97.4	65-133	0			
4-Methyl-2-pentanone	94.47	10	100	0	94.5	69-130	0			
Acetone	103.9	20	100	0	104	53-142	0			
Benzene	45.62	5.0	50	0	91.2	79-120	0			
Bromodichloromethane	45.62	5.0	50	0	91.2	79-121	0			
Bromoform	46.87	5.0	50	0	93.7	74-122	0			
Bromomethane	41.67	10	50	0	83.3	68-131	0			
Carbon disulfide	91.63	10	100	0	91.6	80-124	0			
Carbon tetrachloride	48.57	5.0	50	0	97.1	74-126	0			
Chlorobenzene	44.07	5.0	50	0	88.1	79-120	0			
Chloroethane	47.31	10	50	0	94.6	76-126	0			
Chloroform	44.42	5.0	50	0	88.8	78-120	0			
Chloromethane	42.97	10	50	0	85.9	69-129	0			
cis-1,2-Dichloroethene	44.08	5.0	50	0	88.2	80-120	0			
cis-1,3-Dichloropropene	46.26	5.0	50	0	92.5	77-123	0			
Cyclohexane	48.26	5.0	50	0	96.5	74-126	0			
Dibromochloromethane	45.18	5.0	50	0	90.4	78-122	0			
Dichlorodifluoromethane	48.54	5.0	50	0	97.1	57-140	0			
Ethylbenzene	45.79	5.0	50	0	91.6	80-122	0			
Isopropylbenzene	46.46	5.0	50	0	92.9	72-127	0			
Methyl acetate	41.16	5.0	50	0	82.3	69-123	0			
Methyl tert-butyl ether	43.2	5.0	50	0	86.4	76-121	0			
Methylcyclohexane	46.31	5.0	50	0	92.6	77-126	0			
Styrene	45.68	5.0	50	0	91.4	78-124	0			
Tetrachloroethene	47.64	5.0	50	0	95.3	80-121	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: <b>R60280</b>		Instrument ID <b>VOA3</b>		Method: <b>SW8260</b>			
Toluene	44.63	5.0	50	0	89.3	79-120	0
trans-1,2-Dichloroethene	45.68	5.0	50	0	91.4	79-122	0
trans-1,3-Dichloropropene	45.99	5.0	50	0	92	77-120	0
Trichloroethene	47.82	5.0	50	0	95.6	80-121	0
Trichlorofluoromethane	48.21	5.0	50	0	96.4	75-126	0
Vinyl chloride	49.19	2.0	50	0	98.4	76-126	0
Xylenes, Total	137.4	15	150	0	91.6	80-120	0
<i>Surr: 1,2-Dichloroethane-d4</i>	<i>49.47</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>98.9</i>	<i>70-128</i>	<i>0</i>
<i>Surr: 4-Bromofluorobenzene</i>	<i>51.19</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>102</i>	<i>73-126</i>	<i>0</i>
<i>Surr: Dibromofluoromethane</i>	<i>47.9</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>95.8</i>	<i>71-128</i>	<i>0</i>
<i>Surr: Toluene-d8</i>	<i>49.39</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>98.8</i>	<i>73-127</i>	<i>0</i>

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 29 of 35

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

# QC BATCH REPORT

Batch ID: **R60280** Instrument ID **VOA3** Method: **SW8260**

MSD		Sample ID: <b>0802304-01BMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/25/08 18:46</b>		
Client ID: <b>F14-SB-7 (0-1)</b>		Run ID: <b>VOA3_080225A</b>				SeqNo: <b>1334674</b>		Prep Date:		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	53	5.0	50	0	106	79-124	46.12	13.9	30	
1,1,2,2-Tetrachloroethane	51.12	5.0	50	0	102	75-123	44.29	14.3	30	
1,1,2-Trichlor-1,2,2-trifluoroethane	56.09	5.0	50	0	112	79-125	48.62	14.3	30	
1,1,2-Trichloroethane	51.48	5.0	50	0	103	79-120	45.93	11.4	30	
1,1-Dichloroethane	52.34	5.0	50	0	105	75-124	44.06	17.2	30	
1,1-Dichloroethene	56.56	5.0	50	0	113	80-122	48.08	16.2	30	
1,2,4-Trichlorobenzene	46.78	5.0	50	0	93.6	74-128	41.4	12.2	30	
1,2-Dibromo-3-chloropropane	50.09	5.0	50	0	100	66-129	46.65	7.1	30	
1,2-Dibromoethane	50.1	5.0	50	0	100	79-120	46.23	8.04	30	
1,2-Dichlorobenzene	48	5.0	50	0	96	79-120	41.85	13.7	30	
1,2-Dichloroethane	53.18	5.0	50	0	106	73-121	45.21	16.2	30	
1,2-Dichloropropane	53.18	5.0	50	0	106	76-120	45.05	16.5	30	
1,3-Dichlorobenzene	49.42	5.0	50	0	98.8	79-120	42.83	14.3	30	
1,4-Dichlorobenzene	48.61	5.0	50	0	97.2	77-120	42.58	13.2	30	
2-Butanone	99.88	10	100	0	99.9	65-130	91.1	9.19	30	
2-Hexanone	102.5	10	100	0	103	65-133	97.38	5.14	30	
4-Methyl-2-pentanone	99.71	10	100	0	99.7	69-130	94.47	5.39	30	
Acetone	118.7	20	100	0	119	53-142	103.9	13.3	30	
Benzene	53.75	5.0	50	0	108	79-120	45.62	16.4	30	
Bromodichloromethane	52.91	5.0	50	0	106	79-121	45.62	14.8	30	
Bromoform	50.76	5.0	50	0	102	74-122	46.87	7.97	30	
Bromomethane	49.84	10	50	0	99.7	68-131	41.67	17.9	30	
Carbon disulfide	109.9	10	100	0	110	80-124	91.63	18.1	30	
Carbon tetrachloride	55.5	5.0	50	0	111	74-126	48.57	13.3	30	
Chlorobenzene	50.11	5.0	50	0	100	79-120	44.07	12.8	30	
Chloroethane	55.15	10	50	0	110	76-126	47.31	15.3	30	
Chloroform	52.57	5.0	50	0	105	78-120	44.42	16.8	30	
Chloromethane	50.26	10	50	0	101	69-129	42.97	15.6	30	
cis-1,2-Dichloroethene	49.72	5.0	50	0	99.4	80-120	44.08	12	30	
cis-1,3-Dichloropropene	52.89	5.0	50	0	106	77-123	46.26	13.4	30	
Cyclohexane	55.62	5.0	50	0	111	74-126	48.26	14.2	30	
Dibromochloromethane	49.5	5.0	50	0	99	78-122	45.18	9.14	30	
Dichlorodifluoromethane	57.01	5.0	50	0	114	57-140	48.54	16	30	
Ethylbenzene	51.21	5.0	50	0	102	80-122	45.79	11.2	30	
Isopropylbenzene	51.12	5.0	50	0	102	72-127	46.46	9.57	30	
Methyl acetate	45.84	5.0	50	0	91.7	69-123	41.16	10.8	30	
Methyl tert-butyl ether	50.31	5.0	50	0	101	76-121	43.2	15.2	30	
Methylcyclohexane	53.42	5.0	50	0	107	77-126	46.31	14.3	30	
Styrene	51.31	5.0	50	0	103	78-124	45.68	11.6	30	
Tetrachloroethene	53.81	5.0	50	0	108	80-121	47.64	12.2	30	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: <b>R60280</b>		Instrument ID <b>VOA3</b>		Method: <b>SW8260</b>						
Toluene	51.44	5.0	50	0	103	79-120	44.63	14.2	30	
trans-1,2-Dichloroethene	53.22	5.0	50	0	106	79-122	45.68	15.3	30	
trans-1,3-Dichloropropene	53.13	5.0	50	0	106	77-120	45.99	14.4	30	
Trichloroethene	54.95	5.0	50	0	110	80-121	47.82	13.9	30	
Trichlorofluoromethane	55.76	5.0	50	0	112	75-126	48.21	14.5	30	
Vinyl chloride	56.23	2.0	50	0	112	76-126	49.19	13.4	30	
Xylenes, Total	155.1	15	150	0	103	80-120	137.4	12.2	30	
<i>Surr: 1,2-Dichloroethane-d4</i>	50.62	0	50	0	101	70-128	49.47	2.3	30	
<i>Surr: 4-Bromofluorobenzene</i>	48.93	0	50	0	97.9	73-126	51.19	4.51	30	
<i>Surr: Dibromofluoromethane</i>	49.11	0	50	0	98.2	71-128	47.9	2.5	30	
<i>Surr: Toluene-d8</i>	48.96	0	50	0	97.9	73-127	49.39	0.864	30	

The following samples were analyzed in this batch:

0802304-01B	0802304-02B	0802304-03B
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ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 31 of 35

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: **R60093** Instrument ID **Balance1** Method: **E160.3**

<b>DUP</b>	Sample ID: <b>0802318-04CDUP</b>				Units: <b>wt%</b>			Analysis Date: <b>02/19/08 12:00</b>		
Client ID:	Run ID: <b>BALANCE1_080219B</b>				SeqNo: <b>1330957</b>		Prep Date:		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Percent Moisture	8.126	0.010	0	0	0	0-0	8.382	3.1	20	

<b>DUP</b>	Sample ID: <b>0802346-04ADUP</b>				Units: <b>wt%</b>			Analysis Date: <b>02/19/08 12:00</b>		
Client ID:	Run ID: <b>BALANCE1_080219B</b>				SeqNo: <b>1330961</b>		Prep Date:		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Percent Moisture	37.21	0.010	0	0	0	0-0	37.56	0.935	20	

The following samples were analyzed in this batch:

0802304-01D	0802304-02D	0802304-03D
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ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 32 of 35

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: **R60110** Instrument ID **UV-2450** Method: **E365.3** **(Dissolve)**

MBLK	Sample ID: WBLKW1-022008				Units: mg/Kg			Analysis Date: 02/20/08 10:00		
Client ID:	Run ID: UV-2450_080220A				SeqNo: 1331161		Prep Date:		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Phosphorus, Dissolved (As P)	U	0.13								
Phosphorus, Total (As P)	U	0.50								
Phosphorus, Total Orthophosphate	U	0.13								

LCS	Sample ID: <b>WLCSW1-022008</b>					Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 10:00</b>		
Client ID:	Run ID: <b>UV-2450_080220A</b>				SeqNo: <b>1331162</b>		Prep Date:		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Phosphorus, Total (As P)	13	0.50	12.5	0	104	80-120	0			

MS	Sample ID: 0802300-01CMS					Units: mg/Kg		Analysis Date: 02/20/08 10:00		
Client ID:	Run ID: UV-2450_080220A				SeqNo: 1331180		Prep Date:		DF: 5	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Phosphorus, Total (As P)	114.5	2.5	12.5	88.75	206	80-120	0			SO

DUP	Sample ID: 0802300-01CDUP					Units: mg/Kg		Analysis Date: 02/20/08 10:00		
Client ID:	Run ID: UV-2450_080220A				SeqNo: 1331179		Prep Date:		DF: 5	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Phosphorus, Dissolved (As P)	U	0.65	0	0	0	0-0	0	0	20	
Phosphorus, Total (As P)	86.75	2.5	0	0	0	0-0	88.75	2.28	20	
Phosphorus, Total Orthophosphate	U	0.65	0	0	0	0-0	0	0	20	

The following samples were analyzed in this batch:

0802304-01C	0802304-02C	0802304-03C
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ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: **R60205** Instrument ID **UV-2450** Method: **SW9014**

<b>MBLK</b>	Sample ID: <b>WBLKW1-022208</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 12:00</b>		
Client ID:	Run ID: <b>UV-2450_080222E</b>				SeqNo: <b>1333091</b>	Prep Date:		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	U	2.0								
Cyanide, Amenable to Chlorination	U	2.0								

<b>LCS</b>	Sample ID: <b>WLCSW1-022208</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 12:00</b>		
Client ID:	Run ID: <b>UV-2450_080222E</b>				SeqNo: <b>1333092</b>	Prep Date:		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	9.7	2.0	10	0	97	80-120	0			

<b>MS</b>	Sample ID: <b>0802304-01CMS</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 12:00</b>		
Client ID: <b>F14-SB-7 (0-1)</b>	Run ID: <b>UV-2450_080222E</b>				SeqNo: <b>1333109</b>	Prep Date:		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	9.2	2.0	10	0.1	91	75-125	0			

<b>DUP</b>	Sample ID: <b>0802304-01CDDU</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 12:00</b>		
Client ID: <b>F14-SB-7 (0-1)</b>	Run ID: <b>UV-2450_080222E</b>				SeqNo: <b>1333108</b>	Prep Date:		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	U	2.0	0	0	0	0-0	0.1	0	20	
Cyanide, Amenable to Chlorination	U	2.0	0	0	0	0-0	0	0	0	

The following samples were analyzed in this batch:

0802304-01C	0802304-02C	0802304-03C
-------------	-------------	-------------

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802304  
**Project:** Oro Grande LF- Former Tar Area

## QC BATCH REPORT

Batch ID: **R60293** Instrument ID **UV-2450** Method: **SM4500-SiD**

<b>MBLK</b>	Sample ID: <b>WBLKS1-022608</b>					Units: <b>mg/kg</b>			Analysis Date: <b>02/26/08 11:45</b>		
Client ID:	Run ID: <b>UV-2450_080226C</b>				SeqNo: <b>1334919</b>		Prep Date:		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual	
Silica, Dissolved (as SiO2)	U	0.10									

LCS	Sample ID: WLCSS1-022608					Units: mg/kg		Analysis Date: 02/26/08 11:45		
Client ID:	Run ID: UV-2450_080226C				SeqNo: 1334920		Prep Date:		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Silica, Dissolved (as SiO2)	5.14	0.10	5	0	103	80-120	0			

MS	Sample ID: 0802300-01CMS					Units: mg/kg		Analysis Date: 02/26/08 11:45		
Client ID:	Run ID: UV-2450_080226C				SeqNo: 1334942		Prep Date:		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Silica, Dissolved (as SiO2)	20.28	0.10	5	16.31	79.4	80-120	0			SE

DUP	Sample ID: 0802300-01CDUP					Units: mg/kg		Analysis Date: 02/26/08 11:45		
Client ID:	Run ID: UV-2450_080226C				SeqNo: 1334941		Prep Date:		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Silica, Dissolved (as SiO2)	15.98	0.10	0	0	0		16.31	2.04		

The following samples were analyzed in this batch:

0802304-01D	0802304-02D	0802304-03D
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ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_  
 Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802318  
 Instrument ID: VOA3 Calibration Date(s): 02/22/08 02/22/08  
 Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1839 2313

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2
		A0	A1	A2	
=====	=====	=====	=====	=====	=====
Dichlorodifluoromethane	AVRG		0.22529496		13.7
Chloromethane	AVRG		0.50395004		6.4
Vinyl Chloride	AVRG		0.38061303		12.8
Bromomethane	AVRG		0.47034754		6.3
Chloroethane	AVRG		0.25590152		13.3
Trichlorofluoromethane	AVRG		0.52093848		11.4
Acetone	2ORDR	-0.1030328	7.69742006	-0.4850961	1.000
1,1-Dichloroethene	AVRG		0.44134287		11.8
Methylene Chloride	2ORDR	-2.67e-002	2.12273658	-8.33e-002	1.000
Carbon Disulfide	AVRG		1.23232143		8.2
trans-1,2-Dichloroethene	AVRG		0.52949026		7.2
1,1-Dichloroethane	AVRG		0.62436785		6.0
2-Butanone	AVRG		0.27355813		4.7
cis-1,2-Dichloroethene	AVRG		0.56688104		6.0
Chloroform	AVRG		0.64832752		4.1
1,1,1-Trichloroethane	AVRG		0.56575531		8.3
1,2-Dichloroethane	AVRG		0.21292786		6.0
Carbon Tetrachloride	AVRG		0.31001095		11.5
Benzene	AVRG		0.98477378		5.4
Trichloroethene	AVRG		0.37385412		9.0
Bromodichloromethane	AVRG		0.30312539		7.3
1,2-Dichloropropane	AVRG		0.21848339		6.6
4-Methyl-2-Pentanone	AVRG		0.41051773		6.9
cis-1,3-Dichloropropene	AVRG		0.35972479		6.2
Toluene	AVRG		1.34768016		5.9
trans-1,3-Dichloropropene	AVRG		0.28056964		5.9
2-Hexanone	AVRG		0.27008591		5.0
1,1,2-Trichloroethane	AVRG		0.21712708		4.3
Dibromochloromethane	AVRG		0.35828242		7.5
Tetrachloroethene	AVRG		0.32100523		10.8
1,2-Dibromoethane	AVRG		0.34318420		6.2
Chlorobenzene	AVRG		1.07891045		6.5
Ethylbenzene	AVRG		0.53165863		8.6
m,p-Xylenes	AVRG		0.67727071		8.0
o-Xylene	AVRG		0.64914349		8.2
Styrene	AVRG		1.13325264		8.9
Bromoform	AVRG		0.25184687		8.7

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_  
 Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802318  
 Instrument ID: VOA3 Calibration Date(s): 02/22/08 02/22/08  
 Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1839 2313

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2
		A0	A1	A2	
Isopropylbenzene	AVRG		1.42085798		9.5
1,1,2,2-Tetrachloroethane	AVRG		0.67886333		4.0
1,3-Dichlorobenzene	AVRG		1.60773650		6.6
1,4-Dichlorobenzene	AVRG		1.63839256		5.9
1,2-Dichlorobenzene	AVRG		1.53650202		5.9
1,2-Dibromo-3-Chloropropane	AVRG		0.14824980		9.3
1,2,4-Trichlorobenzene	AVRG		0.99308149		9.6
Methyl tert-butyl ether	AVRG		1.01876955		4.3
Methylcyclohexane	AVRG		0.71459521		14.9
Cyclohexane	AVRG		0.69216911		14.6
Freon TF	AVRG		0.48314480		13.6
Methyl Acetate	AVRG		0.84402848		6.4
Dibromofluoromethane	AVRG		0.53239644		1.8
1,2-Dichloroethane-d4	AVRG		0.27529825		3.4
Toluene-d8	AVRG		1.25374927		2.1
4-Bromofluorobenzene	AVRG		0.45418738		3.2

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802318

Instrument ID: VOA3 Calibration Date(s): 02/22/08 02/22/08

Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1839 2313

LAB FILE ID: RF2.5: G022203 RF5: G022204 RF10: G022205  
RF20: G022206 RF50: G022213

COMPOUND	RF2.5	RF5	RF10	RF20	RF50
=====	=====	=====	=====	=====	=====
Dichlorodifluoromethane		0.196	0.190	0.194	0.262
Chloromethane	0.539	0.551	0.477	0.473	0.528
Vinyl Chloride	0.325	0.332	0.332	0.356	0.431
Bromomethane	0.523	0.492	0.441	0.431	0.482
Chloroethane	0.194	0.237	0.230	0.256	0.282
Trichlorofluoromethane	0.458	0.471	0.466	0.470	0.590
Acetone	0.246	0.212	0.167	0.154	0.134
1,1-Dichloroethene	0.401	0.398	0.371	0.404	0.500
Methylene Chloride	0.674	0.592	0.501	0.516	0.514
Carbon Disulfide	1.202	1.158	1.092	1.122	1.318
trans-1,2-Dichloroethene	0.500	0.512	0.472	0.509	0.576
1,1-Dichloroethane	0.635	0.612	0.548	0.606	0.660
2-Butanone	0.293	0.284	0.267	0.281	0.256
cis-1,2-Dichloroethene	0.539	0.570	0.502	0.568	0.584
Chloroform	0.641	0.657	0.594	0.661	0.686
1,1,1-Trichloroethane	0.551	0.560	0.489	0.510	0.616
1,2-Dichloroethane	0.192	0.218	0.196	0.220	0.227
Carbon Tetrachloride	0.289	0.298	0.276	0.262	0.366
Benzene	0.950	0.987	0.894	0.962	1.067
Trichloroethene	0.380	0.354	0.323	0.347	0.432
Bromodichloromethane	0.274	0.295	0.272	0.310	0.330
1,2-Dichloropropane	0.192	0.222	0.205	0.220	0.237
4-Methyl-2-Pentanone	0.435	0.456	0.398	0.430	0.399
cis-1,3-Dichloropropene	0.342	0.351	0.323	0.366	0.391
Toluene	1.419	1.326	1.243	1.287	1.494
trans-1,3-Dichloropropene	0.260	0.277	0.255	0.293	0.302
2-Hexanone	0.252	0.284	0.260	0.283	0.276
1,1,2-Trichloroethane	0.209	0.223	0.208	0.224	0.232
Dibromochloromethane	0.333	0.351	0.319	0.362	0.398
Tetrachloroethene	0.319	0.304	0.288	0.277	0.388
1,2-Dibromoethane	0.328	0.341	0.315	0.357	0.374
Chlorobenzene	1.118	1.053	0.978	1.057	1.210
Ethylbenzene	0.567	0.506	0.473	0.484	0.609
m,p-Xylenes	0.678	0.643	0.613	0.637	0.786
o-Xylene	0.663	0.600	0.588	0.615	0.748
Styrene	1.068	1.032	1.023	1.110	1.322
Bromoform	0.230	0.248	0.230	0.248	0.288

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802318

Instrument ID: VOA3

Calibration Date(s): 02/22/08 02/22/08

Column: DB624

ID: 0.18 (mm)

Calibration Time(s): 1839 2313

LAB FILE ID:

RF2.5: G022203

RF5: G022204

RF10: G022205

RF20: G022206

RF50: G022213

COMPOUND	RF2.5	RF5	RF10	RF20	RF50
=====	=====	=====	=====	=====	=====
Isopropylbenzene	1.432	1.295	1.266	1.303	1.668
1,1,2,2-Tetrachloroethane	0.654	0.713	0.666	0.719	0.689
1,3-Dichlorobenzene	1.653	1.545	1.460	1.558	1.812
1,4-Dichlorobenzene	1.676	1.641	1.486	1.600	1.813
1,2-Dichlorobenzene	1.607	1.504	1.422	1.519	1.704
1,2-Dibromo-3-Chloropropane	0.124	0.143	0.144	0.153	0.161
1,2,4-Trichlorobenzene	0.984	0.923	0.878	0.928	1.152
Methyl tert-butyl ether	0.980	1.074	0.956	1.063	1.032
Methylcyclohexane	0.679	0.592	0.604	0.600	0.831
Cyclohexane	0.638	0.577	0.585	0.599	0.785
Freon TF	0.430	0.422	0.420	0.419	0.556
Methyl Acetate	0.943	0.800	0.838	0.879	0.792
=====	=====	=====	=====	=====	=====
Dibromofluoromethane	0.527	0.533	0.532	0.552	0.538
1,2-Dichloroethane-d4	0.279	0.282	0.279	0.281	0.266
Toluene-d8	1.219	1.251	1.246	1.259	1.302
4-Bromofluorobenzene	0.438	0.444	0.450	0.451	0.474

FORM VI VOA



FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802318

Instrument ID: VOA3 Calibration Date(s): 02/22/08 02/22/08

Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1839 2313

LAB FILE ID: RF100: G022208 RF150: G022209 RF200: G022210

COMPOUND	RF100	RF150	RF200
=====	=====	=====	=====
Dichlorodifluoromethane	0.242	0.253	0.240
Chloromethane	0.482	0.512	0.469
Vinyl Chloride	0.425	0.434	0.409
Bromomethane	0.457	0.478	0.458
Chloroethane	0.286	0.295	0.267
Trichlorofluoromethane	0.571	0.585	0.556
Acetone	0.137	0.142	0.141
1,1-Dichloroethene	0.482	0.496	0.477
Methylene Chloride	0.486	0.507	
Carbon Disulfide	1.310	1.361	1.295
trans-1,2-Dichloroethene	0.535	0.581	0.551
1,1-Dichloroethane	0.628	0.670	0.635
2-Butanone	0.257	0.274	0.276
cis-1,2-Dichloroethene	0.575	0.618	0.579
Chloroform	0.644	0.666	0.638
1,1,1-Trichloroethane	0.592	0.613	0.593
1,2-Dichloroethane	0.210	0.221	0.220
Carbon Tetrachloride	0.318	0.325	0.347
Benzene	0.975	1.022	1.022
Trichloroethene	0.371	0.382	0.402
Bromodichloromethane	0.300	0.320	0.324
1,2-Dichloropropane	0.214	0.228	0.229
4-Methyl-2-Pentanone	0.370	0.385	0.409
cis-1,3-Dichloropropene	0.350	0.377	0.377
Toluene	1.299	1.341	1.373
trans-1,3-Dichloropropene	0.276	0.290	0.292
2-Hexanone	0.256	0.264	0.285
1,1,2-Trichloroethane	0.206	0.215	0.222
Dibromochloromethane	0.346	0.369	0.389
Tetrachloroethene	0.320	0.323	0.348
1,2-Dibromoethane	0.322	0.342	0.366
Chlorobenzene	1.026	1.074	1.115
Ethylbenzene	0.517	0.537	0.560
m,p-Xylenes	0.660	0.684	0.716
o-Xylene	0.627	0.661	0.691
Styrene	1.120	1.179	1.212
Bromoform	0.236	0.252	0.282

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802318

Instrument ID: VOA3 Calibration Date(s): 02/22/08 02/22/08

Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1839 2313

LAB FILE ID: RF100: G022208 RF150: G022209 RF200: G022210

COMPOUND	RF100	RF150	RF200
=====	=====	=====	=====
Isopropylbenzene	1.418	1.451	1.533
1,1,2,2-Tetrachloroethane	0.640	0.670	0.679
1,3-Dichlorobenzene	1.550	1.616	1.666
1,4-Dichlorobenzene	1.561	1.640	1.691
1,2-Dichlorobenzene	1.450	1.507	1.579
1,2-Dibromo-3-Chloropropane	0.141	0.149	0.170
1,2,4-Trichlorobenzene	0.956	1.013	1.110
Methyl tert-butyl ether	0.979	1.052	1.014
Methylcyclohexane	0.788	0.820	0.803
Cyclohexane	0.778	0.809	0.766
Freon TF	0.530	0.556	0.533
Methyl Acetate	0.806	0.887	0.806
=====	=====	=====	=====
Dibromofluoromethane	0.529	0.529	0.519
1,2-Dichloroethane-d4	0.276	0.282	0.256
Toluene-d8	1.238	1.238	1.277
4-Bromofluorobenzene	0.442	0.456	0.478

FORM VI VOA

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802318

Instrument ID: SV4 Calibration Date(s): 02/18/08 02/18/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1456 1707

LAB FILE ID: RF0.2: 04 RF0.5: 05 RF1: 06  
RF2.5: 07 RF5: 08

COMPOUND	RF0.2	RF0.5	RF1	RF2.5	RF5
Phenol	1.358	1.374	1.643	1.828	1.689
Bis(2-chloroethyl) ether	1.100	1.631	1.262	1.632	1.469
2-Chlorophenol	1.103	1.102	1.253	1.394	1.436
2-Methylphenol	1.539	1.022	1.138	1.404	1.316
bis(2-Chloroisopropyl) ether	0.946	0.546	0.604	0.737	0.735
3&4-Methylphenol	1.295	1.345	1.391	1.505	1.569
N-Nitroso-di-n-propylamine	1.310	0.803	0.919	0.993	1.032
Hexachloroethane	0.612	0.548	0.552	0.636	0.596
Nitrobenzene	0.343	0.374	0.376	0.383	0.367
Isophorone	0.780	0.575	0.618	0.575	0.580
2-Nitrophenol	0.253	0.186	0.215	0.209	0.207
2,4-Dimethylphenol	0.250	0.309	0.309	0.328	0.349
Bis(2-chloroethoxy) methane	0.518	0.368	0.393	0.404	0.399
2,4-Dichlorophenol	0.253	0.309	0.276	0.288	0.271
Naphthalene	1.121	0.987	1.033	1.052	0.962
4-Chloroaniline	0.452	0.454	0.423	0.462	0.444
Hexachlorobutadiene	0.130	0.137	0.140	0.157	0.158
4-Chloro-3-Methylphenol	0.291	0.263	0.273	0.298	0.300
2-Methylnaphthalene	0.610	0.528	0.572	0.576	0.553
Hexachlorocyclopentadiene	0.420	0.354	0.407	0.390	0.364
2,4,6-Trichlorophenol	0.348	0.389	0.441	0.392	0.395
2,4,5-Trichlorophenol	0.366	0.333	0.410	0.477	0.388
2-Chloronaphthalene	1.174	1.018	1.119	1.273	1.120
2-Nitroaniline	0.363	0.392	0.379	0.381	0.388
Dimethylphthalate	1.244	1.436	1.492	1.412	1.280
Acenaphthylene	2.084	2.247	2.194	2.087	1.800
2,6-Dinitrotoluene	0.328	0.254	0.371	0.393	0.337
3-Nitroaniline	0.467	0.409	0.430	0.401	0.410
Acenaphthene	1.095	1.210	1.236	1.257	1.123
2,4-Dinitrophenol	0.195	0.170	0.206	0.241	0.234
Dibenzofuran	1.785	1.644	1.693	1.709	1.519
4-Nitrophenol	0.233	0.128	0.214	0.215	0.207
2,4-Dinitrotoluene	0.414	0.402	0.502	0.490	0.423
Diethylphthalate	1.707	1.447	1.572	1.570	1.360
4-Chlorophenyl phenyl ether	0.559	0.594	0.564	0.613	0.626
Fluorene	1.431	1.446	1.442	1.457	1.336
4-Nitroaniline	0.447	0.349	0.326	0.449	0.394

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802318

Instrument ID: SV4

Calibration Date(s): 02/18/08 02/18/08

Column: RTX-5SIL MS ID: 0.28 (mm)

Calibration Time(s): 1456

1707

LAB FILE ID: RF0.2: 04

RF0.5: 05

RF1: 06

RF2.5: 07

RF5: 08

COMPOUND	RF0.2	RF0.5	RF1	RF2.5	RF5
4,6-Dinitro-2-methylphenol	0.292	0.158	0.201	0.218	0.214
N-Nitrosodiphenylamine	1.043	0.964	0.894	0.970	0.895
4-Bromophenyl-phenylether	0.370	0.197	0.266	0.306	0.285
Hexachlorobenzene	0.355	0.298	0.301	0.315	0.330
Pentachlorophenol	0.170	0.137	0.171	0.194	0.196
Phenanthrene	1.362	1.212	1.134	1.160	1.021
Anthracene	1.337	1.157	1.157	1.207	1.024
Carbazole	1.203	0.937	1.045	1.131	0.972
Di-n-butylphthalate	1.667	1.340	1.393	1.559	1.333
Fluoranthene	1.200	0.962	1.021	1.101	0.984
Pyrene	1.340	1.466	1.226	1.340	1.270
Butylbenzylphthalate	0.722	0.815	0.777	0.805	0.810
Benzo (a) Anthracene	1.148	1.143	1.063	1.237	1.172
3,3'-Dichlorobenzidine	0.463	0.495	0.400	0.506	0.478
bis(2-ethylhexyl)phthalate	1.184	1.239	1.006	1.096	1.155
Chrysene	1.060	1.130	1.198	1.195	1.152
Di-n-octylphthalate	1.796	1.721	1.782	1.900	1.832
Benzo (b) fluoranthene	1.031	0.992	1.167	1.242	1.142
Benzo (k) fluoranthene	1.086	1.251	1.162	1.254	1.197
Benzo (a) pyrene	1.058	0.948	1.071	1.116	1.056
Indeno (1,2,3-cd) pyrene	0.929	0.902	0.937	1.049	1.005
Dibenzo (a,h) anthracene	0.881	0.972	0.972	1.110	1.049
Benzo (g,h,i) perylene	0.989	1.035	1.037	1.163	1.092
Acetophenone	0.465	0.485	0.477	0.472	0.487
Caprolactam	0.119	0.132	0.124	0.132	0.123
1,1'-Biphenyl	1.480	1.515	1.700	1.612	1.460
Benzaldehyde	1.174	0.902	0.927	1.051	1.090
Atrazine	0.260	0.256	0.306	0.301	0.284
Phenol-d6	1.333	1.477	1.456	1.737	1.799
2-Fluorophenol	1.344	1.098	1.114	1.115	1.334
Nitrobenzene-d5	0.384	0.350	0.397	0.353	0.383
2-Fluorobiphenyl	1.320	1.335	1.536	1.490	1.313
2,4,6-Tribromophenol	0.237	0.167	0.217	0.211	0.194
4-Terphenyl-d14	0.856	0.766	0.759	0.899	0.892

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802318

Instrument ID: SV4

Calibration Date(s): 02/18/08 02/18/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1456 1707

LAB FILE ID: RF7.5: 09

RF10: 10

COMPOUND	RF7.5	RF10	CURVE	COEFFICIENT A1	%RSD OR R^2
Phenol	1.477	1.496	AVRG	1.55237249	11.2
Bis(2-chloroethyl)ether	1.490	1.467	AVRG	1.43577916	13.5
2-Chlorophenol	1.299	1.258	AVRG	1.26349376	10.2
2-Methylphenol	1.230	1.261	AVRG	1.27276875	13.3
bis(2-Chloroisopropyl)ether	0.663	0.664	AVRG	0.69920313	18.4
3&4-Methylphenol	1.420	1.441	AVRG	1.42378532	6.5
N-Nitroso-di-n-propylamine	0.873	0.908	AVRG	0.97702089	16.9
Hexachloroethane	0.535	0.590	AVRG	0.58130953	6.4
Nitrobenzene	0.366	0.342	AVRG	0.36439188	4.4
Isophorone	0.555	0.527	AVRG	0.60137266	13.8
2-Nitrophenol	0.192	0.198	AVRG	0.20840540	10.6
2,4-Dimethylphenol	0.333	0.300	AVRG	0.31135015	10.3
Bis(2-chloroethoxy)methane	0.378	0.359	AVRG	0.40268100	13.2
2,4-Dichlorophenol	0.262	0.247	AVRG	0.27241001	7.9
Naphthalene	0.934	0.802	AVRG	0.98456767	10.3
4-Chloroaniline	0.430	0.398	AVRG	0.43750279	5.0
Hexachlorobutadiene	0.150	0.137	AVRG	0.14414966	7.6
4-Chloro-3-Methylphenol	0.292	0.276	AVRG	0.28473151	4.9
2-Methylnaphthalene	0.538	0.485	AVRG	0.55184946	7.2
Hexachlorocyclopentadiene	0.361	0.348	AVRG	0.37783877	7.4
2,4,6-Trichlorophenol	0.336	0.346	AVRG	0.37841589	9.8
2,4,5-Trichlorophenol	0.381	0.374	AVRG	0.38989390	11.5
2-Chloronaphthalene	1.027	0.975	AVRG	1.10095914	9.4
2-Nitroaniline	0.348	0.337	AVRG	0.36989139	5.6
Dimethylphthalate	1.228	1.105	AVRG	1.31374176	10.4
Acenaphthylene	1.713	1.514	AVRG	1.94842423	14.1
2,6-Dinitrotoluene	0.329	0.321	AVRG	0.33345904	13.1
3-Nitroaniline	0.351	0.373	AVRG	0.40604530	9.3
Acenaphthene	1.055	0.978	AVRG	1.13641941	9.0
2,4-Dinitrophenol	0.220	0.238	AVRG	0.21504048	12.1
Dibenzofuran	1.429	1.301	AVRG	1.58285406	10.9
4-Nitrophenol	0.190	0.196	AVRG	0.19763210	17.1
2,4-Dinitrotoluene	0.433	0.396	AVRG	0.43739851	9.6
Diethylphthalate	1.262	1.172	AVRG	1.44137385	13.2
4-Chlorophenyl phenyl ether	0.552	0.539	AVRG	0.57827942	5.7
Fluorene	1.252	1.166	AVRG	1.36140900	8.4
4-Nitroaniline	0.375	0.371	AVRG	0.38749355	12.1

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802318

Instrument ID: SV4

Calibration Date(s): 02/18/08 02/18/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1456 1707

LAB FILE ID: RF7.5: 09

RF10: 10

COMPOUND	RF7.5	RF10	CURVE	COEFFICIENT A1	%RSD OR R^2
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	0.217	0.205	AVRG	0.21499811	18.4
N-Nitrosodiphenylamine	0.868	0.779	AVRG	0.91594993	9.3
4-Bromophenyl-phenylether	0.284	0.251	AVRG	0.27981927	19.0
Hexachlorobenzene	0.305	0.283	AVRG	0.31252239	7.6
Pentachlorophenol	0.189	0.178	AVRG	0.17641698	11.5
Phenanthrene	1.016	0.886	AVRG	1.11288714	13.9
Anthracene	1.036	0.868	AVRG	1.11228630	13.6
Carbazole	0.956	0.833	AVRG	1.01112107	12.4
Di-n-butylphthalate	1.336	1.088	AVRG	1.38808587	13.3
Fluoranthene	1.021	0.868	AVRG	1.02234608	10.3
Pyrene	1.238	1.084	AVRG	1.28073938	9.3
Butylbenzylphthalate	0.766	0.742	AVRG	0.77666486	4.6
Benzo(a)Anthracene	1.133	1.060	AVRG	1.13655748	5.4
3,3'-Dichlorobenzidine	0.482	0.446	AVRG	0.46697209	7.6
bis(2-ethylhexyl)phthalate	1.066	1.011	AVRG	1.10814417	8.0
Chrysene	1.113	0.977	AVRG	1.11794146	7.0
Di-n-octylphthalate	1.712	1.721	AVRG	1.78058429	3.9
Benzo(b)fluoranthene	1.059	1.143	AVRG	1.11095640	7.8
Benzo(k)fluoranthene	1.179	1.125	AVRG	1.17899987	5.2
Benzo(a)pyrene	1.000	1.030	AVRG	1.03991573	5.2
Indeno(1,2,3-cd)pyrene	0.982	1.018	AVRG	0.97460842	5.5
Dibenzo(a,h)anthracene	0.996	1.064	AVRG	1.00622547	7.5
Benzo(g,h,i)perylene	1.002	1.068	AVRG	1.05510709	5.6
Acetophenone	0.447	0.425	AVRG	0.46543254	4.8
Caprolactam	0.122	0.122	AVRG	0.12481386	4.2
1,1'-Biphenyl	1.346	1.233	AVRG	1.47791741	10.6
Benzaldehyde	0.894	0.947	AVRG	0.99779091	10.8
Atrazine	0.268	0.266	AVRG	0.27738086	7.2
=====	=====	=====	=====	=====	=====
Phenol-d6	1.554	1.571	AVRG	1.56135306	10.4
2-Fluorophenol	1.135	1.097	AVRG	1.17676838	9.5
Nitrobenzene-d5	0.358	0.339	AVRG	0.36624628	5.9
2-Fluorobiphenyl	1.220	1.126	AVRG	1.33424549	10.7
2,4,6-Tribromophenol	0.190	0.191	AVRG	0.20091324	11.3
4-Terphenyl-d14	0.861	0.815	AVRG	0.83562888	6.8

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802318

Instrument ID: SV2 Calibration Date(s): 02/21/08 02/21/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1027 1304

LAB FILE ID: RF0.2: 04 RF0.5: 05 RF1: 06  
RF2.5: 02 RF5: 07

COMPOUND	RF0.2	RF0.5	RF1	RF2.5	RF5
Phenol	2.102	1.954	2.031	2.013	2.104
Bis(2-chloroethyl) ether	1.551	1.504	1.564	1.543	1.614
2-Chlorophenol	1.574	1.569	1.486	1.498	1.546
2-Methylphenol	1.451	1.433	1.458	1.465	1.482
bis(2-Chloroisopropyl) ether	0.610	0.482	0.533	0.503	0.557
3&4-Methylphenol	1.696	1.660	1.726	1.722	1.771
N-Nitroso-di-n-propylamine	1.623	1.438	1.398	1.382	1.431
Hexachloroethane	0.657	0.758	0.757	0.732	0.764
Nitrobenzene	0.465	0.434	0.454	0.443	0.469
Isophorone	0.748	0.698	0.745	0.756	0.786
2-Nitrophenol	0.157	0.162	0.166	0.174	0.181
2,4-Dimethylphenol	0.315	0.301	0.326	0.334	0.350
Bis(2-chloroethoxy)methane	0.500	0.470	0.467	0.487	0.505
2,4-Dichlorophenol	0.215	0.222	0.240	0.238	0.242
Naphthalene	0.993	1.064	1.068	1.094	1.136
4-Chloroaniline	0.439	0.433	0.419	0.444	0.464
Hexachlorobutadiene	0.108	0.112	0.117	0.112	0.122
4-Chloro-3-Methylphenol	0.336	0.330	0.321	0.326	0.337
2-Methylnaphthalene	0.497	0.525	0.500	0.531	0.553
Hexachlorocyclopentadiene	0.252	0.271	0.273	0.284	0.292
2,4,6-Trichlorophenol	0.346	0.311	0.318	0.337	0.350
2,4,5-Trichlorophenol	0.296	0.332	0.335	0.364	0.380
2-Chloronaphthalene	1.118	1.042	1.115	1.207	1.132
2-Nitroaniline	0.468	0.483	0.558	0.566	0.601
Dimethylphthalate	1.310	1.244	1.272	1.281	1.335
Acenaphthylene	1.922	1.888	1.932	2.028	2.092
2,6-Dinitrotoluene	0.274	0.258	0.283	0.294	0.303
3-Nitroaniline	0.372	0.374	0.372	0.378	0.395
Acenaphthene	1.161	1.122	1.139	1.133	1.210
2,4-Dinitrophenol	0.091	0.098	0.112	0.125	0.139
Dibenzofuran	1.578	1.508	1.549	1.561	1.631
4-Nitrophenol	0.146	0.212	0.218	0.250	0.253
2,4-Dinitrotoluene	0.381	0.321	0.310	0.381	0.401
Diethylphthalate	1.488	1.348	1.416	1.429	1.517
4-Chlorophenyl phenyl ether	0.551	0.488	0.535	0.508	0.539
Fluorene	1.276	1.321	1.300	1.327	1.415
4-Nitroaniline	0.364	0.322	0.350	0.387	0.409

FORM VI SV



FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802318

Instrument ID: SV2

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-5SIL MS ID: 0.28 (mm)

Calibration Time(s): 1027

1304

LAB FILE ID: RF0.2: 04

RF0.5: 05

RF1: 06

RF2.5: 02

RF5: 07

COMPOUND	RF0.2	RF0.5	RF1	RF2.5	RF5
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	0.114	0.117	0.120	0.138	0.160
N-Nitrosodiphenylamine	1.014	0.931	0.963	0.966	1.019
4-Bromophenyl-phenylether	0.227	0.214	0.231	0.233	0.258
Hexachlorobenzene	0.277	0.248	0.254	0.262	0.268
Pentachlorophenol	0.134	0.120	0.123	0.146	0.146
Phenanthrene	1.179	1.092	1.150	1.247	1.250
Anthracene	1.056	1.046	1.087	1.135	1.209
Carbazole	1.010	0.980	1.010	1.026	1.136
Di-n-butylphthalate	1.454	1.336	1.417	1.485	1.566
Fluoranthene	0.926	0.910	0.945	0.969	1.079
Pyrene	1.523	1.491	1.637	1.638	1.651
Butylbenzylphthalate	0.954	0.917	0.935	0.962	0.977
Benzo(a)Anthracene	1.324	1.191	1.220	1.294	1.298
3,3'-Dichlorobenzidine	0.510	0.459	0.485	0.487	0.512
bis(2-ethylhexyl)phthalate	1.721	1.320	1.378	1.386	1.365
Chrysene	1.277	1.135	1.175	1.208	1.230
Di-n-octylphthalate	2.156	2.138	2.088	2.284	2.259
Benzo(b)fluoranthene	1.135	1.128	1.053	1.159	1.163
Benzo(k)fluoranthene	1.176	1.042	1.202	1.219	1.273
Benzo(a)pyrene	1.060	1.052	1.078	1.155	1.102
Indeno(1,2,3-cd)pyrene	1.059	1.022	1.037	1.026	1.087
Dibenzo(a,h)anthracene	1.091	1.011	0.988	1.030	1.064
Benzo(g,h,i)perylene	1.153	1.060	1.108	1.100	1.087
Acetophenone	0.491	0.491	0.528	0.517	0.555
Caprolactam	0.103	0.108	0.114	0.119	0.127
1,1'-Biphenyl	1.499	1.500	1.540	1.512	1.605
Benzaldehyde	1.294	1.372	1.373	1.386	1.422
Atrazine	0.273	0.245	0.272	0.289	0.292
=====	=====	=====	=====	=====	=====
Phenol-d6	2.109	1.976	1.988	2.057	2.108
2-Fluorophenol	1.433	1.319	1.328	1.352	1.399
Nitrobenzene-d5	0.490	0.459	0.477	0.445	0.500
2-Fluorobiphenyl	1.282	1.248	1.294	1.299	1.368
2,4,6-Tribromophenol	0.123	0.136	0.132	0.151	0.157
4-Terphenyl-d14	0.905	0.781	0.917	0.886	0.944

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802318

Instrument ID: SV2

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1027 1304

LAB FILE ID: RF7.5: 08

RF10: 09

COMPOUND	RF7.5	RF10	CURVE	COEFFICIENT A1	%RSD OR R^2
Phenol	2.031	2.055	AVRG	2.04151462	2.6
Bis(2-chloroethyl) ether	1.541	1.603	AVRG	1.56006712	2.4
2-Chlorophenol	1.518	1.528	AVRG	1.53143896	2.2
2-Methylphenol	1.431	1.519	AVRG	1.46269403	2.1
bis(2-Chloroisopropyl) ether	0.519	0.520	AVRG	0.53198972	7.8
3&4-Methylphenol	1.732	1.729	AVRG	1.71933322	2.0
N-Nitroso-di-n-propylamine	1.353	1.379	AVRG	1.42920357	6.3
Hexachloroethane	0.751	0.735	AVRG	0.73633014	5.0
Nitrobenzene	0.450	0.448	AVRG	0.45189923	2.7
Isophorone	0.783	0.750	AVRG	0.75239795	3.9
2-Nitrophenol	0.174	0.179	AVRG	0.17028983	5.2
2,4-Dimethylphenol	0.344	0.334	AVRG	0.32923171	5.1
Bis(2-chloroethoxy) methane	0.505	0.485	AVRG	0.48842577	3.2
2,4-Dichlorophenol	0.241	0.240	AVRG	0.23397414	4.6
Naphthalene	1.103	1.074	AVRG	1.07606306	4.1
4-Chloroaniline	0.442	0.439	AVRG	0.44016440	3.1
Hexachlorobutadiene	0.117	0.111	AVRG	0.11410328	4.1
4-Chloro-3-Methylphenol	0.327	0.329	AVRG	0.32945539	1.7
2-Methylnaphthalene	0.529	0.519	AVRG	0.52204397	3.7
Hexachlorocyclopentadiene	0.283	0.286	AVRG	0.27737763	4.8
2,4,6-Trichlorophenol	0.320	0.370	AVRG	0.33616256	6.3
2,4,5-Trichlorophenol	0.337	0.343	AVRG	0.34090480	7.8
2-Chloronaphthalene	1.086	1.226	AVRG	1.13244208	5.7
2-Nitroaniline	0.562	0.591	AVRG	0.54704708	9.4
Dimethylphthalate	1.172	1.143	AVRG	1.25107785	5.6
Acenaphthylene	1.975	2.002	AVRG	1.97723717	3.5
2,6-Dinitrotoluene	0.300	0.304	AVRG	0.28802259	5.9
3-Nitroaniline	0.375	0.387	AVRG	0.37923197	2.3
Acenaphthene	1.136	1.154	AVRG	1.15080942	2.5
2,4-Dinitrophenol	0.148	0.153	AVRG	0.12366819	19.7
Dibenzofuran	1.562	1.569	AVRG	1.56531331	2.4
4-Nitrophenol	0.237	0.248	AVRG	0.22363685	16.8
2,4-Dinitrotoluene	0.388	0.389	AVRG	0.36733394	9.8
Diethylphthalate	1.412	1.362	AVRG	1.42479396	4.3
4-Chlorophenyl phenyl ether	0.513	0.521	AVRG	0.52215621	4.1
Fluorene	1.328	1.345	AVRG	1.33030617	3.3
4-Nitroaniline	0.389	0.417	AVRG	0.37699467	8.9

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802318

Instrument ID: SV2

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1027 1304

LAB FILE ID: RF7.5: 08

RF10: 09

COMPOUND	RF7.5	RF10	CURVE	COEFFICIENT A1	%RSD OR R^2
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	0.166	0.172	AVRG	0.14120648	17.6
N-Nitrosodiphenylamine	0.956	0.916	AVRG	0.96653515	4.0
4-Bromophenyl-phenylether	0.239	0.239	AVRG	0.23452449	5.6
Hexachlorobenzene	0.244	0.252	AVRG	0.25797937	4.5
Pentachlorophenol	0.140	0.142	AVRG	0.13600494	7.9
Phenanthrene	1.219	1.247	AVRG	1.19763704	5.0
Anthracene	1.158	1.119	AVRG	1.11574628	5.2
Carbazole	1.030	1.030	AVRG	1.03179925	4.8
Di-n-butylphthalate	1.487	1.467	AVRG	1.45902268	4.8
Fluoranthene	1.002	1.018	AVRG	0.97828581	6.0
Pyrene	1.540	1.634	AVRG	1.58779022	4.2
Butylbenzylphthalate	0.933	0.962	AVRG	0.94843957	2.2
Benzo(a)Anthracene	1.259	1.357	AVRG	1.27756432	4.6
3,3'-Dichlorobenzidine	0.470	0.516	AVRG	0.49114015	4.5
bis(2-ethylhexyl)phthalate	1.306	1.345	AVRG	1.40286279	10.2
Chrysene	1.138	1.199	AVRG	1.19475326	4.2
Di-n-octylphthalate	2.172	2.360	AVRG	2.20800231	4.3
Benzo(b)fluoranthene	1.249	1.352	AVRG	1.17694160	8.2
Benzo(k)fluoranthene	1.089	1.221	AVRG	1.17448042	6.9
Benzo(a)pyrene	1.075	1.167	AVRG	1.09854858	4.2
Indeno(1,2,3-cd)pyrene	1.034	1.120	AVRG	1.05515135	3.5
Dibenzo(a,h)anthracene	1.004	1.095	AVRG	1.04034869	4.1
Benzo(g,h,i)perylene	1.056	1.152	AVRG	1.10220494	3.6
Acetophenone	0.513	0.516	AVRG	0.51603419	4.3
Caprolactam	0.125	0.106	AVRG	0.11464004	8.4
1,1'-Biphenyl	1.509	1.462	AVRG	1.51835980	2.9
Benzaldehyde	1.375	1.369	AVRG	1.37018648	2.8
Atrazine	0.276	0.272	AVRG	0.27421832	5.6
=====	=====	=====	=====	=====	=====
Phenol-d6	2.009	1.997	AVRG	2.03491737	2.8
2-Fluorophenol	1.403	1.431	AVRG	1.38053979	3.4
Nitrobenzene-d5	0.456	0.456	AVRG	0.46905779	4.3
2-Fluorobiphenyl	1.287	1.317	AVRG	1.29948123	2.8
2,4,6-Tribromophenol	0.146	0.144	AVRG	0.14125239	8.2
4-Terphenyl-d14	0.908	0.950	AVRG	0.89874637	6.3

FORM VI SV

FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802318

Instrument ID: SV4 Calibration Date: 02/20/08 Time: 1548

Lab File ID: 02 Init. Calib. Date(s): 02/18/08 02/18/08

Init. Calib. Times: 1456 1707

GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	RRF	RRF2.5	MIN RRF	%D	MAX %D
Phenol	1.552	1.513	0.8	2.5	20.0
Bis (2-chloroethyl) ether	1.436	1.196	0.7	16.7	20.0
2-Chlorophenol	1.264	1.199	0.8	5.1	20.0
2-Methylphenol	1.273	1.265	0.7	0.6	20.0
bis (2-Chloroisopropyl) ether	0.699	0.675	0.01	3.4	20.0
3&4-Methylphenol	1.424	1.292	0.6	9.3	20.0
N-Nitroso-di-n-propylamine	0.977	0.870	0.5	11.0	20.0
Hexachloroethane	0.581	0.535	0.3	7.9	20.0
Nitrobenzene	0.364	0.350	0.2	3.8	20.0
Isophorone	0.601	0.544	0.4	9.5	20.0
2-Nitrophenol	0.208	0.190	0.1	8.6	20.0
2,4-Dimethylphenol	0.311	0.320	0.2	2.9	20.0
Bis (2-chloroethoxy) methane	0.403	0.380	0.3	5.7	20.0
2,4-Dichlorophenol	0.272	0.256	0.2	5.9	20.0
Naphthalene	0.984	0.963	0.7	2.1	20.0
4-Chloroaniline	0.438	0.418	0.01	4.6	20.0
Hexachlorobutadiene	0.144	0.162	0.01	12.5	20.0
4-Chloro-3-Methylphenol	0.285	0.280	0.2	1.8	20.0
2-Methylnaphthalene	0.552	0.520	0.4	5.8	20.0
Hexachlorocyclopentadiene	0.378	0.401	0.05	6.1	20.0
2,4,6-Trichlorophenol	0.378	0.362	0.2	4.2	20.0
2,4,5-Trichlorophenol	0.390	0.415	0.2	6.4	20.0
2-Chloronaphthalene	1.101	1.205	0.8	9.4	20.0
2-Nitroaniline	0.370	0.333	0.01	10.0	20.0
Dimethylphthalate	1.314	1.289	0.01	1.9	20.0
Acenaphthylene	1.948	1.823	0.9	6.4	20.0
2,6-Dinitrotoluene	0.333	0.329	0.2	1.2	20.0
3-Nitroaniline	0.406	0.397	0.01	2.2	20.0
Acenaphthene	1.136	1.107	0.9	2.6	20.0
2,4-Dinitrophenol	0.215	0.199	0.01	7.4	20.0
Dibenzofuran	1.583	1.555	0.8	1.8	20.0
4-Nitrophenol	0.198	0.178	0.01	10.1	20.0
2,4-Dinitrotoluene	0.437	0.389	0.2	11.0	20.0
Diethylphthalate	1.441	1.326	0.01	8.0	20.0
4-Chlorophenyl phenyl ether	0.578	0.590	0.4	2.1	20.0
Fluorene	1.361	1.277	0.9	6.2	20.0
4-Nitroaniline	0.387	0.390	0.01	0.8	20.0

FORM VII SV

FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802318

Instrument ID: SV4 Calibration Date: 02/20/08 Time: 1548

Lab File ID: 02 Init. Calib. Date(s): 02/18/08 02/18/08

Init. Calib. Times: 1456 1707

GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	RRF	RRF2.5	MIN RRF	%D	MAX %D
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	0.215	0.194	0.01	9.8	20.0
N-Nitrosodiphenylamine	0.916	0.880	0.01	3.9	20.0
4-Bromophenyl-phenylether	0.280	0.280	0.01	0.0	20.0
Hexachlorobenzene	0.312	0.273	0.1	12.5	20.0
Pentachlorophenol	0.176	0.174	0.05	1.1	20.0
Phenanthrene	1.113	1.142	0.7	2.6	20.0
Anthracene	1.112	1.109	0.7	0.3	20.0
Carbazole	1.011	0.995	0.01	1.6	20.0
Di-n-butylphthalate	1.388	1.349	0.01	2.8	20.0
Fluoranthene	1.022	1.055	0.6	3.2	20.0
Pyrene	1.280	1.305	0.6	2.0	20.0
Butylbenzylphthalate	0.777	0.742	0.01	4.5	20.0
Benzo (a) Anthracene	1.136	1.166	0.8	2.6	20.0
3,3'-Dichlorobenzidine	0.467	0.492	0.01	5.4	20.0
bis(2-ethylhexyl)phthalate	1.108	1.055	0.01	4.8	20.0
Chrysene	1.118	1.145	0.7	2.4	20.0
Di-n-octylphthalate	1.780	1.663	0.01	6.6	20.0
Benzo (b) fluoranthene	1.111	1.102	0.7	0.8	20.0
Benzo (k) fluoranthene	1.179	1.222	0.7	3.6	20.0
Benzo (a) pyrene	1.040	1.064	0.7	2.3	20.0
Indeno (1,2,3-cd) pyrene	0.974	0.979	0.5	0.5	20.0
Dibenzo (a,h) anthracene	1.006	1.030	0.4	2.4	20.0
Benzo (g,h,i) perylene	1.055	0.988	0.5	6.4	20.0
Acetophenone	0.465	0.457	0.01	1.7	20.0
Caprolactam	0.125	0.115	0.01	8.0	20.0
1,1'-Biphenyl	1.478	1.398	0.01	5.4	20.0
Benzaldehyde	0.998	0.993	0.01	0.5	20.0
Atrazine	0.277	0.276	0.01	0.4	20.0
=====	=====	=====	=====	=====	=====
Phenol-d6	1.561	1.489	0.01	4.6	20.0
2-Fluorophenol	1.177	1.135	0.01	3.6	20.0
Nitrobenzene-d5	0.366	0.313	0.01	14.5	20.0
2-Fluorobiphenyl	1.334	1.325	0.01	0.7	20.0
2,4,6-Tribromophenol	0.201	0.206	0.01	2.5	20.0
4-Terphenyl-d14	0.835	0.916	0.01	9.7	20.0

FORM VII SV

FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802318

Instrument ID: SV2 Calibration Date: 02/25/08 Time: 0756

Lab File ID: 02 Init. Calib. Date(s): 02/21/08 02/21/08

Init. Calib. Times: 1027 1304

GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	RRF	RRF2.5	MIN RRF	%D	MAX %D
=====	=====	=====	=====	=====	=====
Phenol	2.041	2.021	0.8	1.0	20.0
Bis(2-chloroethyl) ether	1.560	1.571	0.7	0.7	20.0
2-Chlorophenol	1.531	1.581	0.8	3.3	20.0
2-Methylphenol	1.463	1.518	0.7	3.8	20.0
bis(2-Chloroisopropyl) ether	0.532	0.530	0.01	0.4	20.0
3&4-Methylphenol	1.719	1.761	0.6	2.4	20.0
N-Nitroso-di-n-propylamine	1.429	1.379	0.5	3.5	20.0
Hexachloroethane	0.736	0.753	0.3	2.3	20.0
Nitrobenzene	0.452	0.429	0.2	5.1	20.0
Isophorone	0.752	0.710	0.4	5.6	20.0
2-Nitrophenol	0.170	0.179	0.1	5.3	20.0
2,4-Dimethylphenol	0.329	0.343	0.2	4.2	20.0
Bis(2-chloroethoxy) methane	0.488	0.477	0.3	2.2	20.0
2,4-Dichlorophenol	0.234	0.258	0.2	10.2	20.0
Naphthalene	1.076	1.082	0.7	0.6	20.0
4-Chloroaniline	0.440	0.443	0.01	0.7	20.0
Hexachlorobutadiene	0.114	0.116	0.01	1.8	20.0
4-Chloro-3-Methylphenol	0.329	0.321	0.2	2.4	20.0
2-Methylnaphthalene	0.522	0.519	0.4	0.6	20.0
Hexachlorocyclopentadiene	0.277	0.280	0.05	1.1	20.0
2,4,6-Trichlorophenol	0.336	0.326	0.2	3.0	20.0
2,4,5-Trichlorophenol	0.341	0.346	0.2	1.5	20.0
2-Chloronaphthalene	1.132	1.297	0.8	14.6	20.0
2-Nitroaniline	0.547	0.546	0.01	0.2	20.0
Dimethylphthalate	1.251	1.271	0.01	1.6	20.0
Acenaphthylene	1.977	1.976	0.9	0.0	20.0
2,6-Dinitrotoluene	0.288	0.291	0.2	1.0	20.0
3-Nitroaniline	0.379	0.357	0.01	5.8	20.0
Acenaphthene	1.151	1.139	0.9	1.0	20.0
2,4-Dinitrophenol	0.124	0.134	0.01	8.1	20.0
Dibenzofuran	1.565	1.544	0.8	1.3	20.0
4-Nitrophenol	0.223	0.241	0.01	8.1	20.0
2,4-Dinitrotoluene	0.367	0.365	0.2	0.5	20.0
Diethylphthalate	1.424	1.393	0.01	2.2	20.0
4-Chlorophenyl phenyl ether	0.522	0.502	0.4	3.8	20.0
Fluorene	1.330	1.312	0.9	1.4	20.0
4-Nitroaniline	0.377	0.392	0.01	4.0	20.0

FORM VII SV

FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802318

Instrument ID: SV2 Calibration Date: 02/25/08 Time: 0756

Lab File ID: 02 Init. Calib. Date(s): 02/21/08 02/21/08

Init. Calib. Times: 1027 1304

GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	RRF	RRF2.5	MIN RRF	%D	MAX %D
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	0.141	0.150	0.01	6.4	20.0
N-Nitrosodiphenylamine	0.966	0.916	0.01	5.2	20.0
4-Bromophenyl-phenylether	0.234	0.209	0.01	10.7	20.0
Hexachlorobenzene	0.258	0.239	0.1	7.4	20.0
Pentachlorophenol	0.136	0.138	0.05	1.5	20.0
Phenanthrene	1.198	1.165	0.7	2.8	20.0
Anthracene	1.116	1.128	0.7	1.1	20.0
Carbazole	1.032	0.946	0.01	8.3	20.0
Di-n-butylphthalate	1.459	1.308	0.01	10.3	20.0
Fluoranthene	0.978	0.881	0.6	9.9	20.0
Pyrene	1.588	1.630	0.6	2.6	20.0
Butylbenzylphthalate	0.948	0.913	0.01	3.7	20.0
Benzo (a) Anthracene	1.278	1.278	0.8	0.0	20.0
3,3'-Dichlorobenzidine	0.491	0.495	0.01	0.8	20.0
bis(2-ethylhexyl)phthalate	1.403	1.316	0.01	6.2	20.0
Chrysene	1.194	1.219	0.7	2.1	20.0
Di-n-octylphthalate	2.208	2.128	0.01	3.6	20.0
Benzo (b) fluoranthene	1.177	1.148	0.7	2.5	20.0
Benzo (k) fluoranthene	1.174	1.176	0.7	0.2	20.0
Benzo (a) pyrene	1.098	1.104	0.7	0.5	20.0
Indeno (1,2,3-cd) pyrene	1.055	1.089	0.5	3.2	20.0
Dibenzo (a,h) anthracene	1.040	1.040	0.4	0.0	20.0
Benzo (g,h,i) perylene	1.102	1.080	0.5	2.0	20.0
Acetophenone	0.516	0.516	0.01	0.0	20.0
Caprolactam	0.114	0.116	0.01	1.8	20.0
1,1'-Biphenyl	1.518	1.530	0.01	0.8	20.0
Benzaldehyde	1.370	1.365	0.01	0.4	20.0
Atrazine	0.274	0.249	0.01	9.1	20.0
=====	=====	=====	=====	=====	=====
Phenol-d6	2.035	2.060	0.01	1.2	20.0
2-Fluorophenol	1.381	1.364	0.01	1.2	20.0
Nitrobenzene-d5	0.469	0.431	0.01	8.1	20.0
2-Fluorobiphenyl	1.299	1.287	0.01	0.9	20.0
2,4,6-Tribromophenol	0.141	0.143	0.01	1.4	20.0
4-Terphenyl-d14	0.899	0.886	0.01	1.4	20.0

FORM VII SV



FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53

(mm)

Calibration Time(s): 1519

1810

LAB FILE ID:

RF0.005: 006

RF0.01: 007

RF0.02: 008

RF0.04: 009

RF0.06: 010

RF0.08: 011

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
=====	=====	=====	=====	=====	=====	=====
alpha-BHC	4703	9952	20806	49102	76316	112985
gamma-BHC	4917	10317	21430	49512	75715	110507
Heptachlor	1337400.0	1355800.0	1326400.0	1403625.0	1369433.3	1452975.0
Endosulfan I	315400.00	320900.00	310700.00	319900.00	309400.00	322887.50
Dieldrin	1055000.0	1090600.0	1090375.0	1183612.5	1173325.0	1253556.3
Endrin	797400.00	797850.00	802650.00	867850.00	849391.67	916862.50
4,4'-DDD	738000.00	767900.00	801300.00	889762.50	889050.00	961175.00
4,4'-DDT	946100.00	991500.00	1004225.0	1085512.5	1072158.3	1147662.5
Methoxychlor	639420.00	643240.00	623200.00	617895.00	584006.67	604390.00
=====	=====	=====	=====	=====	=====	=====
Tetrachloro-m-xylene	1156200.0	1163100.0	1130500.0	1145300.0	1082450.0	1118837.5
Decachlorobiphenyl	1742300.0	1717600.0	1596650.0	1531712.5	1418600.0	1451331.3

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53 (mm)

Calibration Time(s): 1519

1810

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2	MAX %RSD OR R^2
		A0	A1	A2		
alpha-BHC	2ORDR	1.213e-003	8.968e-007	-1.76e-012	0.9994761	0.9900000
gamma-BHC	2ORDR	9.75e-004	8.859e-007	-1.53e-012	0.9994627	0.9900000
Heptachlor	AVRG		1374272.22		3.424	20.000
Endosulfan I	AVRG		316531.250		1.770	20.000
Dieldrin	AVRG		1141078.13		6.561	20.000
Endrin	AVRG		838667.361		5.780	20.000
4,4'-DDD	AVRG		841197.917		10.179	20.000
4,4'-DDT	AVRG		1041193.06		7.076	20.000
Methoxychlor	AVRG		618691.944		3.586	20.000
Tetrachloro-m-xylene	AVRG		1132731.25		2.606	20.000
Decachlorobiphenyl	AVRG		1576365.63		8.530	20.000

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53

(mm)

Calibration Time(s): 1844

2135

LAB FILE ID:

RF0.005: 012

RF0.01: 013.

RF0.02: 014

RF0.04: 015

RF0.06: 016

RF0.08: 017

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
beta-BHC	779600.00	682900.00	819250.00	774400.00	747550.00	757150.00
delta-BHC	4316	7873	20636	43136	67306	96565
Aldrin	1224000.0	1076600.0	1321850.0	1292725.0	1286950.0	1340325.0
Heptachlor epoxide	1407600.0	1155900.0	1415250.0	1299000.0	1260716.7	1287600.0
gamma-Chlordane	1396800.0	1205000.0	1430100.0	1346200.0	1308966.7	1337712.5
alpha-Chlordane	1371200.0	1193800.0	1412950.0	1339425.0	1321066.7	1346712.5
4,4'-DDE	303600.00	272750.00	343575.00	336837.50	328391.67	334500.00
Endosulfan II	1165100.0	1008900.0	1218525.0	1149975.0	1121858.3	1143275.0
Endrin aldehyde	1103800.0	929950.00	1104450.0	994512.50	953983.33	953756.25
Endosulfan sulfate	1034600.0	890200.00	1056650.0	998475.00	962850.00	988568.75
Endrin ketone	1211700.0	1052500.0	1293750.0	1232637.5	1197025.0	1225406.3

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53 (mm)

Calibration Time(s): 1844

2135

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R <sup>2</sup>	MAX %RSD OR R <sup>2</sup>
		A0	A1	A2		
beta-BHC	AVRG		760141.667		5.944	20.000
delta-BHC	2ORDR	1.36e-003	9.701e-007	-1.59e-012	0.9994617	0.9900000
Aldrin	AVRG		1257075.00		7.709	20.000
Heptachlor epoxide	AVRG		1304344.44		7.450	20.000
gamma-Chlordane	AVRG		1337463.19		5.843	20.000
alpha-Chlordane	AVRG		1330859.03		5.580	20.000
4,4'-DDE	AVRG		319942.361		8.412	20.000
Endosulfan II	AVRG		1134605.56		6.138	20.000
Endrin aldehyde	AVRG		1006742.01		7.771	20.000
Endosulfan sulfate	AVRG		988557.292		5.931	20.000
Endrin ketone	AVRG		1202169.79		6.693	20.000

FORM VI PEST

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i      Injection Date: 24-FEB-2008 10:40  
Lab File ID: 040.D      Init. Cal. Date(s): 23-FEB-2008    23-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    15:19      21:35  
Lab Sample ID: INDB-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
4 beta-BHC	760142	778350	778350	0.010	-2.39539	15.00000	Averaged
5 delta-BHC	0.02000	0.01997	991700	0.010	0.12774	15.00000	Quadratic
7 Aldrin	1257075	1236900	1236900	0.010	1.60492	15.00000	Averaged
8 Heptachlor epoxide	1304344	1335600	1335600	0.010	-2.39627	15.00000	Averaged
9 gamma-Chlordane	1337463	1352350	1352350	0.010	-1.11306	15.00000	Averaged
10 alpha-Chlordane	1330859	1307200	1307200	0.010	1.77773	15.00000	Averaged
12 4,4'-DDE	319942	334425	334425	0.010	-4.52664	15.00000	Averaged
16 Endosulfan II	1134606	1188675	1188675	0.010	-4.76548	15.00000	Averaged
18 Endrin aldehyde	1006742	1101675	1101675	0.010	-9.42972	15.00000	Averaged
19 Endosulfan sulfate	988557	1088675	1088675	0.010	-10.12766	15.00000	Averaged
21 Endrin ketone	1202170	1347550	1347550	0.010	-12.09315	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 11:53  
 Lab File ID: 042.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDA-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
\$ 1 Tetrachloro-m-xylene	1132731	1096050	1096050	0.010	3.23830	15.00000	Averaged
2 alpha-BHC	0.02000	0.01844	999600	0.010	7.80259	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01877	1041650	0.010	6.17493	15.00000	Quadratic
6 Heptachlor	1374272	1291200	1291200	0.010	6.04482	15.00000	Averaged
11 Endosulfan I	316531	298450	298450	0.010	5.71231	15.00000	Averaged
13 Dieldrin	1141078	1056575	1056575	0.010	7.40555	15.00000	Averaged
14 Endrin	838667	911100	911100	0.010	-8.63664	15.00000	Averaged
15 4,4'-DDD	841198	797375	797375	0.010	5.20958	15.00000	Averaged
17 4,4'-DDT	1041193	1025400	1025400	0.010	1.51682	15.00000	Averaged
20 Methoxychlor	618692	670130	670130	0.010	-8.31400	15.00000	Averaged
\$ 25 Decachlorobiphenyl	1576366	1769750	1769750	0.010	-12.26774	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 23:33  
 Lab File ID: 061.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDA-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL	MIN	MAX		CURVE TYPE
			RRFO.020	RRF	%D / %DRIFT	%D / %DRIFT	
\$ 1 Tetrachloro-m-xylene	1132731	1011800	1011800	0.010	10.67608	15.00000	Averaged
2 alpha-BHC	0.02000	0.01700	913050	0.010	14.98259	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01724	949050	0.010	13.81305	15.00000	Quadratic
6 Heptachlor	1374272	1170350	1170350	0.010	14.83856	15.00000	Averaged
11 Endosulfan I	316531	273550	273550	0.010	13.57883	15.00000	Averaged
13 Dieldrin	1141078	977275	977275	0.010	14.35512	15.00000	Averaged
14 Endrin	838667	786800	786800	0.010	6.18450	15.00000	Averaged
15 4,4'-DDD	841198	728525	728525	0.010	13.39434	15.00000	Averaged
17 4,4'-DDT	1041193	933500	933500	0.010	10.34324	15.00000	Averaged
20 Methoxychlor	618692	617625	617625	0.010	0.17245	15.00000	Averaged
\$ 25 Decachlorobiphenyl	1576366	1544975	1544975	0.010	1.99133	15.00000	Averaged



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 25-FEB-2008 00:08  
 Lab File ID: 062.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDB-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRFO.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
4 beta-BHC	760142	686100	686100	0.010	9.74051	15.00000	Averaged
5 delta-BHC	0.02000	0.01758	860250	0.010	12.10447	15.00000	Quadratic
7 Aldrin	1257075	1096100	1096100	0.010	12.80552	15.00000	Averaged
8 Heptachlor epoxide	1304344	1192150	1192150	0.010	8.60160	15.00000	Averaged
9 gamma-Chlordane	1337463	1207300	1207300	0.010	9.73210	15.00000	Averaged
10 alpha-Chlordane	1330859	1173750	1173750	0.010	11.80508	15.00000	Averaged
12 4,4'-DDE	319942	293825	293825	0.010	8.16315	15.00000	Averaged
16 Endosulfan II	1134606	1058150	1058150	0.010	6.73851	15.00000	Averaged
18 Endrin aldehyde	1006742	973625	973625	0.010	3.28952	15.00000	Averaged
19 Endosulfan sulfate	988557	983800	983800	0.010	0.48124	15.00000	Averaged
21 Endrin ketone	1202170	1203475	1203475	0.010	-0.10857	15.00000	Averaged

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm) Calibration Time(s): 1519 1810

LAB FILE ID:

RF0.005: 006

RF0.01: 007

RF0.02: 008

RF0.04: 009

RF0.06: 010

RF0.08: 011

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
alpha-BHC	4366	9243	19463	45125	68168	96897
gamma-BHC	4659	9791	20206	45154	67093	94014
Heptachlor	1075800.0	1076200.0	1018500.0	1052350.0	1015966.7	1052237.5
Endosulfan I	245600.00	243300.00	238750.00	248175.00	240500.00	248050.00
Dieldrin	818800.00	828900.00	828575.00	875750.00	846383.33	880200.00
Endrin	555400.00	548800.00	540225.00	567687.50	546191.67	573825.00
4,4'-DDD	597000.00	613300.00	621125.00	653725.00	634558.33	659343.75
4,4'-DDT	711300.00	730350.00	717525.00	734662.50	710008.33	736912.50
Methoxychlor	398160.00	380230.00	348445.00	326115.00	300443.33	306826.25
Tetrachloro-m-xylene	975000.00	961700.00	898100.00	877925.00	815966.67	819412.50
Decachlorobiphenyl	1327300.0	1236550.0	1098100.0	991950.00	897141.67	891937.50

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 1519 1810

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2	MAX %RSD OR R^2
		A0	A1	A2		
alpha-BHC	2ORDR	1.336e-003	9.397e-007	-1.31e-012	0.9994175	0.9900000
gamma-BHC	2ORDR	9.163e-004	9.317e-007	-9.41e-013	0.9994792	0.9900000
Heptachlor	AVRG		1048509.03		2.523	20.000
Endosulfan I	AVRG		244062.500		1.604	20.000
Dieldrin	AVRG		846434.722		3.076	20.000
Endrin	AVRG		555354.861		2.346	20.000
4,4'-DDD	AVRG		629842.014		3.818	20.000
4,4'-DDT	AVRG		723459.722		1.656	20.000
Methoxychlor	AVRG		343369.931		11.548	20.000
Tetrachloro-m-xylene	AVRG		891350.694		7.614	20.000
Decachlorobiphenyl	AVRG		1073829.86		16.779	20.000

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 1844

2135

LAB FILE ID:

RF0.005: 012

RF0.01: 013

RF0.02: 014

RF0.04: 015

RF0.06: 016

RF0.08: 017

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
beta-BHC	774400.00	656400.00	754850.00	674025.00	631650.00	620262.50
delta-BHC	4184	7319	19399	39861	60746	84295
Aldrin	1011600.0	880600.00	1062900.0	1024875.0	1002283.3	1016825.0
Heptachlor epoxide	1078600.0	918000.00	1049200.0	974875.00	934800.00	937175.00
gamma-Chlordane	1127800.0	960600.00	1088500.0	998250.00	953516.67	954600.00
alpha-Chlordane	1235600.0	969100.00	1133650.0	1007350.0	954050.00	952775.00
4,4'-DDE	235800.00	213600.00	270650.00	260587.50	248450.00	250243.75
Endosulfan II	922100.00	784900.00	919400.00	845975.00	799233.33	793168.75
Endrin aldehyde	870700.00	711700.00	804750.00	698562.50	654216.67	640612.50
Endosulfan sulfate	767700.00	648600.00	758975.00	700837.50	663850.00	668818.75
Endrin ketone	962900.00	792950.00	965100.00	868362.50	818233.33	818743.75

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 1844

2135

COMPOUND	CURVE	COEFFICENTS			%RSD OR R^2	MAX %RSD OR R^2
		A0	A1	A2		
beta-BHC	AVRG		685264.583		9.423	20.000
delta-BHC	2ORDR	1.459e-003	1.007e-006	-8.66e-013	0.9993746	0.9900000
Aldrin	AVRG		999847.222		6.206	20.000
Heptachlor epoxide	AVRG		982108.333		6.789	20.000
gamma-Chlordane	AVRG		1013877.78		7.484	20.000
alpha-Chlordane	AVRG		1042087.50		11.198	20.000
4,4'-DDE	AVRG		246555.208		8.104	20.000
Endosulfan II	AVRG		844129.514		7.468	20.000
Endrin aldehyde	AVRG		730090.278		12.318	20.000
Endosulfan sulfate	AVRG		701463.542		7.261	20.000
Endrin ketone	AVRG		871048.264		8.730	20.000

FORM VI PEST

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i      Injection Date: 24-FEB-2008 10:40  
Lab File ID: 040.D      Init. Cal. Date(s): 23-FEB-2008    23-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    15:19      21:35  
Lab Sample ID: INDB-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL	MIN	MAX		CURVE TYPE
			RRFO.020	RRF	%D / %DRIFT	%D / %DRIFT	
4 beta-BHC	685265	712700	712700	0.010	-4.00362	15.00000	Averaged
5 delta-BHC	0.02000	0.01990	930250	0.010	0.50844	15.00000	Quadratic
7 Aldrin	999847	979350	979350	0.010	2.05004	15.00000	Averaged
8 Heptachlor epoxide	982108	1029750	1029750	0.010	-4.85096	15.00000	Averaged
9 gamma-Chlordane	1013878	1023850	1023850	0.010	-0.98357	15.00000	Averaged
10 alpha-Chlordane	1042088	1088450	1088450	0.010	-4.44900	15.00000	Averaged
12 4,4'-DDE	246555	265900	265900	0.010	-7.84603	15.00000	Averaged
16 Endosulfan II	844130	884525	884525	0.010	-4.78546	15.00000	Averaged
18 Endrin aldehyde	730090	791000	791000	0.010	-8.34277	15.00000	Averaged
19 Endosulfan sulfate	701464	771975	771975	0.010	-10.05205	15.00000	Averaged
21 Endrin ketone	871048	976575	976575	0.010	-12.11491	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 11:53  
Lab File ID: 042.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
Lab Sample ID: INDA-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL	MIN	MAX		CURVE TYPE
			RRF	%D / %DRIFT	%D / %DRIFT		
\$ 1 Tetrachloro-m-xylene	891351	872000	872000	0.010	2.17094	15.00000	Averaged
2 alpha-BHC	0.02000	0.01861	943650	0.010	6.96596	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01890	984600	0.010	5.50485	15.00000	Quadratic
6 Heptachlor	1048509	1000250	1000250	0.010	4.60263	15.00000	Averaged
11 Endosulfan I	244063	230350	230350	0.010	5.61844	15.00000	Averaged
13 Dieldrin	846435	802350	802350	0.010	5.20828	15.00000	Averaged
14 Endrin	555355	590900	590900	0.010	-6.40044	15.00000	Averaged
15 4,4'-DDD	629842	576525	576525	0.010	8.46514	15.00000	Averaged
17 4,4'-DDT	723460	711200	711200	0.010	1.69460	15.00000	Averaged
20 Methoxychlor	343370	379375	379375	0.010	-10.48580	15.00000	Averaged
\$ 25 Decachlorobiphenyl	1073830	1089975	1089975	0.010	-1.50351	15.00000	Averaged



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 23:33  
Lab File ID: 061.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
Lab Sample ID: INDA-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1 Tetrachloro-m-xylene	891351	801200	801200	0.010	10.11394	15.00000	Averaged
2 alpha-BHC	0.02000	0.01702	854950	0.010	14.88483	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01710	884300	0.010	14.49731	15.00000	Quadratic
6 Heptachlor	1048509	896700	896700	0.010	14.47856	15.00000	Averaged
11 Endosulfan I	244063	210950	210950	0.010	13.56722	15.00000	Averaged
13 Dieldrin	846435	730575	730575	0.010	13.68797	15.00000	Averaged
14 Endrin	555355	508725	508725	0.010	8.39641	15.00000	Averaged
15 4,4'-DDD	629842	536175	536175	0.010	14.87151	15.00000	Averaged
17 4,4'-DDT	723460	650150	650150	0.010	10.13321	15.00000	Averaged
20 Methoxychlor	343370	350680	350680	0.010	-2.12892	15.00000	Averaged
25 Decachlorobiphenyl	1073830	1034425	1034425	0.010	3.66956	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i      Injection Date: 25-FEB-2008 00:08  
Lab File ID: 062.D      Init. Cal. Date(s): 23-FEB-2008    23-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    15:19      21:35  
Lab Sample ID: INDB-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL	MIN	MAX		CURVE TYPE
			RRFO.020	RRF	%D / %DRIFT	%D / %DRIFT	
14 beta-BHC	685265	624300	624300	0.010	8.89650	15.00000	Averaged
15 delta-BHC	0.02000	0.01728	796100	0.010	13.61898	15.00000	Quadratic
17 Aldrin	999847	872300	872300	0.010	12.75667	15.00000	Averaged
18 Heptachlor epoxide	982108	898450	898450	0.010	8.51824	15.00000	Averaged
19 gamma-Chlordane	1013878	904200	904200	0.010	10.81765	15.00000	Averaged
10 alpha-Chlordane	1042088	964100	964100	0.010	7.48378	15.00000	Averaged
12 4,4'-DDE	246555	228975	228975	0.010	7.13033	15.00000	Averaged
16 Endosulfan II	844130	779700	779700	0.010	7.63266	15.00000	Averaged
18 Endrin aldehyde	730090	693550	693550	0.010	5.00490	15.00000	Averaged
19 Endosulfan sulfate	701464	689500	689500	0.010	1.70551	15.00000	Averaged
21 Endrin ketone	871048	865125	865125	0.010	0.68002	15.00000	Averaged

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP

ID: 0.50

(mm)

Calibration Time(s): 1704

2048

LAB FILE ID:

RF0.02: 006

RF0.04: 007

RF0.08: 008

RF0.2: 009

RF0.5: 010

RF0.7: 011

COMPOUND	RF0.02	RF0.04	RF0.08	RF0.2	RF0.5	RF0.7
=====	=====	=====	=====	=====	=====	=====
2,4-DB	5108	9719	18353	41322	87879	118108
Dicamba	12307	22969	42954	95072	203285	268904
Dichlorprop	9154	16682	30960	65694	134828	175040
Dalapon	6745	11203	19791	42458	87260	110919
Dinoseb	5342	11986	42389	58458	126744	188628
MCPA	12002	18958	30045	52002	92400	114748
MCPP	6640	11132	18174	32745	58460	72824
2,4,5-TP (Silvex)	7923	14045	28145	67736	154903	206955
2,4,5-T	7840	14982	30069	70942	158635	210003
2,4-D	10207	18232	33189	70147	141447	183884
=====	=====	=====	=====	=====	=====	=====
DCAA	9088	16340	28995	60056	121328	157601

FORM VI HERB

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP

ID: 0.50 (mm)

Calibration Time(s): 1704

2048

RF1: 012

COMPOUND	RF1	CURVE	COEFFICIENTS			%RSD OR R^2	MA
			A0	A1	A2		
=====	=====	=====	=====	=====	=====	=====	==
2,4-DB	157499	2ORDR	-9.04e-003	4.822e-006	1.01e-011	0.9998403	0
Dicamba	356790	2ORDR	-4.28e-003	1.013e-006	1.126e-012	0.9999391	0
Dichlorprop	228577	2ORDR	-9.79e-003	2.795e-006	7.136e-012	0.9999235	0
Dalapon	147393	2ORDR	-7.33e-003	2.268e-006	8.085e-012	0.9996880	0
Dinoseb	271766	2ORDR	-6.2e-003	9.93e-007	-1.68e-013	0.9932724	0
MCPA	141799	2ORDR	-1.9041304	2.504e-004	3.303e-009	0.9998884	0
MCPP	91657	2ORDR	-2.0604654	4.603e-004	7.178e-009	0.9997430	0
2,4,5-TP (Silvex)	266465	2ORDR	1.51e-003	6.045e-007	1.208e-012	0.9996141	0
2,4,5-T	281777	2ORDR	-4.61e-004	6.635e-007	8.038e-013	0.9999780	0
2,4-D	244226	2ORDR	-1.61e-002	2.855e-006	5.423e-012	0.9996761	0
=====	=====	=====	=====	=====	=====	=====	==
DCAA	206190	2ORDR	-1.48e-002	3.168e-006	8.563e-012	0.9998612	0

FORM VI HERB

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 24-FEB-2008 10:49  
 Lab File ID: 042.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
15 2 DCAA	0.50000	0.53731	258336	0.001	-7.46261	15.00000	Quadratic
11 Dalapon	0.25000	0.27749	376236	0.001	-10.99699	15.00000	Quadratic
13 Dicamba	0.25000	0.26678	863052	0.001	-6.71144	15.00000	Quadratic
14 MCPP	50.00000	51.71683	1205	0.001	-3.43365	15.00000	Quadratic
15 MCPA	50.00000	51.20469	1889	0.001	-2.40938	15.00000	Quadratic
16 Dichlorprop	0.50000	0.52565	281796	0.001	-5.12902	15.00000	Quadratic
17 2,4-D	0.50000	0.51129	289722	0.001	-2.25873	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.13289	1309888	0.001	-6.30811	15.00000	Quadratic
110 2,4,5-T	0.12500	0.12678	1284320	0.001	-1.42146	15.00000	Quadratic
111 2,4-DB	0.50000	0.48285	172760	0.001	3.42934	15.00000	Quadratic
112 Dinoseb	0.12500	0.13366	1154928	0.001	-6.92564	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 24-FEB-2008 22:14  
 Lab File ID: 060.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
2 DCAA	0.50000	0.50678	246880	0.001	-1.35502	15.00000	Quadratic
1 Dalapon	0.25000	0.25245	349412	0.001	-0.97995	15.00000	Quadratic
13 Dicamba	0.25000	0.24917	815640	0.001	0.33341	15.00000	Quadratic
14 MCPP	50.00000	50.52478	1187	0.001	-1.04956	15.00000	Quadratic
15 MCPA	50.00000	45.15155	1747	0.001	9.69690	15.00000	Quadratic
16 Dichlorprop	0.50000	0.50502	273156	0.001	-1.00361	15.00000	Quadratic
17 2,4-D	0.50000	0.53555	300610	0.001	-7.11041	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12710	1263288	0.001	-1.67989	15.00000	Quadratic
110 2,4,5-T	0.12500	0.12805	1295360	0.001	-2.44012	15.00000	Quadratic
111 2,4-DB	0.50000	0.50456	179338	0.001	-0.91216	15.00000	Quadratic
112 Dinoseb	0.12500	0.12716	1099960	0.001	-1.72761	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 25-FEB-2008 03:48  
 Lab File ID: 069.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	CCAL	MIN	MAX	CURVE TYPE
\$ 2 DCAA	0.50000	0.50051	244504	0.001	-0.10237	15.00000 Quadratic
1 Dalapon	0.25000	0.24676	343204	0.001	1.29689	15.00000 Quadratic
13 Dicamba	0.25000	0.24613	807376	0.001	1.54838	15.00000 Quadratic
14 MCPP	50.00000	50.05595	1180	0.001	-0.11190	15.00000 Quadratic
15 MCPA	50.00000	44.58560	1733	0.001	10.82879	15.00000 Quadratic
16 Dichlorprop	0.50000	0.49980	270952	0.001	0.04022	15.00000 Quadratic
17 2,4-D	0.50000	0.53677	301152	0.001	-7.35360	15.00000 Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12556	1250768	0.001	-0.44762	15.00000 Quadratic
110 2,4,5-T	0.12500	0.12695	1285800	0.001	-1.55788	15.00000 Quadratic
111 2,4-DB	0.50000	0.50242	178692	0.001	-0.48386	15.00000 Quadratic
112 Dinoseb	0.12500	0.12606	1090704	0.001	-0.85107	15.00000 Quadratic



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 26-FEB-2008 08:37  
 Lab File ID: 073.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1\$ 2 DCAA	0.50000	0.55554	265074	0.001	-11.10735	15.00000	Quadratic
11 Dalapon	0.25000	0.28400	383084	0.001	-13.60089	15.00000	Quadratic
13 Dicamba	0.25000	0.27260	878536	0.001	-9.03960	15.00000	Quadratic
14 MCPP	50.00000	53.68835	1234	0.001	-7.37670	15.00000	Quadratic
15 MCPA	50.00000	51.36391	1893	0.001	-2.72783	15.00000	Quadratic
16 Dichlorprop	0.50000	0.54634	290356	0.001	-9.26877	15.00000	Quadratic
17 2,4-D	0.50000	0.54601	305262	0.001	-9.20294	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.13854	1354808	0.001	-10.83156	15.00000	Quadratic
10 2,4,5-T	0.12500	0.13688	1371176	0.001	-9.50187	15.00000	Quadratic
11 2,4-DB	0.50000	0.52682	186014	0.001	-5.36301	15.00000	Quadratic
12 Dinoseb	0.12500	0.13985	1207408	0.001	-11.87655	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i      Injection Date: 26-FEB-2008 11:21  
Lab File ID: 077.D      Init. Cal. Date(s): 18-NOV-2003    21-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    10:47      20:48  
Lab Sample ID: HSTD-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

			CCAL	MIN		MAX	
COMPOUND	RRF / AMOUNT	RF0.500	RRFO.500	RRF	%D / %DRIFT	%D / %DRIFT	CURVE TYPE
\$ 2 DCAA	0.50000	0.52550	253930	0.001	-5.10032	15.00000	Quadratic
1 Dalapon	0.25000	0.27362	372140	0.001	-9.44858	15.00000	Quadratic
13 Dicamba	0.25000	0.25620	834684	0.001	-2.48109	15.00000	Quadratic
14 MCPP	50.00000	49.41464	1170	0.001	1.17072	15.00000	Quadratic
15 MCPA	50.00000	44.62263	1734	0.001	10.75473	15.00000	Quadratic
16 Dichlorprop	0.50000	0.50196	271866	0.001	-0.39223	15.00000	Quadratic
17 2,4-D	0.50000	0.51874	293078	0.001	-3.74731	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12844	1274112	0.001	-2.74906	15.00000	Quadratic
110 2,4,5-T	0.12500	0.12864	1300480	0.001	-2.91338	15.00000	Quadratic
111 2,4-DB	0.50000	0.48669	173928	0.001	2.66165	15.00000	Quadratic
112 Dinoseb	0.12500	0.12678	1096712	0.001	-1.42007	15.00000	Quadratic

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP2

ID: 0.42

(mm)

Calibration Time(s): 1704

2048

LAB FILE ID:

RF0.02: 006

RF0.04: 007

RF0.08: 008

RF0.2: 009

RF0.5: 010

RF0.7: 011

COMPOUND	RF0.02	RF0.04	RF0.08	RF0.2	RF0.5	RF0.7
=====	=====	=====	=====	=====	=====	=====
2,4-DB	4429	8316	15774	36286	80830	109256
Dicamba	9653	18320	36038	85536	195927	266691
Dichlorprop	8187	14910	28154	62007	133922	177222
Dalapon	4566	9433	16118	36897	81288	104733
Dinoseb	2094	7777	16880	46589	110909	159057
MCPA	10749	16922	27448	49512	89522	112269
MCPP	6622	10361	17168	31016	55789	70470
2,4,5-TP (Silvex)	5684	11127	23049	59599	147258	203220
2,4,5-T	6330	12148	24753	61099	146782	200264
2,4-D	13150	23359	43061	93050	201157	267861
=====	=====	=====	=====	=====	=====	=====
DCAA	7653	14328	26178	55097	116119	154115

FORM VI HERB

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP2 ID: 0.42 (mm)

Calibration Time(s): 1704 2048

RF1: 012

COMPOUND	RF1	CURVE	COEFFICIENTS			%RSD OR R^2	MA
			A0	A1	A2		
=====	=====	=====	=====	=====	=====	=====	==
2,4-DB	149047	2ORDR	-8.53e-003	5.629e-006	7.697e-012	0.9999219	0
Dicamba	364266	2ORDR	-2.05e-003	1.163e-006	5.934e-013	0.9999696	0
Dichlorprop	236311	2ORDR	-9.11e-003	3.138e-006	4.815e-012	0.9999453	0
Dalapon	143839	2ORDR	-5.61e-003	2.749e-006	5.455e-012	0.9995201	0
Dinoseb	223767	2ORDR	1.848e-003	1.069e-006	1.739e-013	0.9997660	0
MCPA	142230	2ORDR	-2.6028993	3.368e-004	2.724e-009	0.9997388	0
MCPP	89670	2ORDR	-2.8035158	5.661e-004	6.533e-009	0.9995755	C
2,4,5-TP (Silvex)	281496	2ORDR	1.113e-003	7.94e-007	3.171e-013	0.9999785	C
2,4,5-T	273205	2ORDR	5.073e-004	7.71e-007	5.169e-013	0.9999833	C
2,4-D	355303	2ORDR	-1.07e-002	2.093e-006	2.116e-012	0.9999484	C
=====	=====	=====	=====	=====	=====	=====	==
DCAA	206441	2ORDR	-1.55e-002	3.715e-006	5.894e-012	0.9998071	C

FORM VI HERB

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 24-FEB-2008 10:49  
Lab File ID: 042.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
Lab Sample ID: HSTD-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	RRF0.500	CCAL	MIN	MAX	CURVE TYPE
9 2 DCAA	0.50000	0.50662	236670	0.001	-1.32485	15.00000	Quadratic
1 Dalapon	0.25000	0.26306	335176	0.001	-5.22292	15.00000	Quadratic
3 Dicamba	0.25000	0.25417	799872	0.001	-1.66928	15.00000	Quadratic
14 MCPP	50.00000	47.66807	1093	0.001	4.66385	15.00000	Quadratic
15 MCPA	50.00000	51.24477	1835	0.001	-2.48954	15.00000	Quadratic
16 Dichlorprop	0.50000	0.50458	271014	0.001	-0.91575	15.00000	Quadratic
7 2,4-D	0.50000	0.47952	391116	0.001	4.09563	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12382	1168224	0.001	0.94184	15.00000	Quadratic
10 2,4,5-T	0.12500	0.11865	1120576	0.001	5.08372	15.00000	Quadratic
11 2,4-DB	0.50000	0.49537	161254	0.001	0.92692	15.00000	Quadratic
12 Dinoseb	0.12500	0.13953	1009328	0.001	-11.62198	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 24-FEB-2008 22:14  
 Lab File ID: 060.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
2 DCAA	0.50000	0.51087	238330	0.001	-2.17386	15.00000	Quadratic
1 Dalapon	0.25000	0.26458	336836	0.001	-5.83142	15.00000	Quadratic
13 Dicamba	0.25000	0.25506	802416	0.001	-2.02553	15.00000	Quadratic
14 MCPP	50.00000	50.63049	1139	0.001	-1.26098	15.00000	Quadratic
15 MCPA	50.00000	50.03380	1806	0.001	-0.06760	15.00000	Quadratic
16 Dichlorprop	0.50000	0.51422	275344	0.001	-2.84426	15.00000	Quadratic
17 2,4-D	0.50000	0.51958	418276	0.001	-3.91509	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12956	1219832	0.001	-3.64438	15.00000	Quadratic
10 2,4,5-T	0.12500	0.13334	1247760	0.001	-6.66846	15.00000	Quadratic
11 2,4-DB	0.50000	0.51984	168350	0.001	-3.96764	15.00000	Quadratic
12 Dinoseb	0.12500	0.13986	1011744	0.001	-11.89094	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 25-FEB-2008 03:48  
 Lab File ID: 069.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
2 DCAA	0.50000	0.50723	236906	0.001	-1.44545	15.00000	Quadratic
1 Dalapon	0.25000	0.25955	331336	0.001	-3.81819	15.00000	Quadratic
3 Dicamba	0.25000	0.25329	797344	0.001	-1.31546	15.00000	Quadratic
4 MCPP	50.00000	50.43933	1136	0.001	-0.87866	15.00000	Quadratic
5 MCPA	50.00000	48.48593	1769	0.001	3.02814	15.00000	Quadratic
6 Dichlorprop	0.50000	0.50973	273328	0.001	-1.94524	15.00000	Quadratic
7 2,4-D	0.50000	0.51858	417610	0.001	-3.71679	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12883	1213336	0.001	-3.06594	15.00000	Quadratic
10 2,4,5-T	0.12500	0.13288	1243840	0.001	-6.30311	15.00000	Quadratic
11 2,4-DB	0.50000	0.51513	166990	0.001	-3.02656	15.00000	Quadratic
12 Dinoseb	0.12500	0.13905	1005904	0.001	-11.24085	15.00000	Quadratic



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 26-FEB-2008 08:37  
 Lab File ID: 073.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
2 DCAA	0.50000	0.51011	238032	0.001	-2.02133	15.00000	Quadratic
1 Dalapon	0.25000	0.26716	339644	0.001	-6.86244	15.00000	Quadratic
3 Dicamba	0.25000	0.25492	802008	0.001	-1.96839	15.00000	Quadratic
4 MCPP	50.00000	46.82714	1080	0.001	6.34573	15.00000	Quadratic
5 MCPA	50.00000	55.40108	1933	0.001	-10.80216	15.00000	Quadratic
6 Dichlorprop	0.50000	0.51088	273848	0.001	-2.17695	15.00000	Quadratic
7 2,4-D	0.50000	0.49706	403076	0.001	0.58731	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12767	1202904	0.001	-2.13772	15.00000	Quadratic
10 2,4,5-T	0.12500	0.12640	1187960	0.001	-1.11672	15.00000	Quadratic
11 2,4-DB	0.50000	0.49605	161454	0.001	0.78950	15.00000	Quadratic
12 Dinoseb	0.12500	0.14025	1014512	0.001	-12.19912	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 26-FEB-2008 11:21  
Lab File ID: 077.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
Lab Sample ID: HSTD-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	CCAL		MIN		MAX		CURVE TYPE
	RRF / AMOUNT	RFO.500	RRFO.500	RRF	%D / %DRIFT	%D / %DRIFT	
19 2 DCAA	0.50000	0.51109	238418	0.001	-2.21891	15.00000	Quadratic
1 Dalapon	0.25000	0.26745	339960	0.001	-6.97860	15.00000	Quadratic
13 Dicamba	0.25000	0.25427	800152	0.001	-1.70848	15.00000	Quadratic
14 MCPP	50.00000	49.40591	1120	0.001	1.18818	15.00000	Quadratic
15 MCPA	50.00000	52.36002	1862	0.001	-4.72004	15.00000	Quadratic
16 Dichlorprop	0.50000	0.51000	273452	0.001	-2.00048	15.00000	Quadratic
17 2,4-D	0.50000	0.50608	409186	0.001	-1.21666	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12737	1200144	0.001	-1.89229	15.00000	Quadratic
10 2,4,5-T	0.12500	0.12858	1206872	0.001	-2.86749	15.00000	Quadratic
11 2,4-DB	0.50000	0.51083	165744	0.001	-2.16561	15.00000	Quadratic
12 Dinoseb	0.12500	0.14079	1018376	0.001	-12.62938	15.00000	Quadratic

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuares  
 Curve Type : Average

## Calibration File Names:

Level 1: \\Nitro\chem\ECD-7.i\080225.b\008.D  
 Level 2: \\Nitro\chem\ECD-7.i\080225.b\009.D  
 Level 3: \\Nitro\chem\ECD-7.i\080225.b\010.D  
 Level 4: \\Nitro\chem\ECD-7.i\080225.b\011.D  
 Level 5: \\Nitro\chem\ECD-7.i\080225.b\012.D  
 Level 6: \\Nitro\chem\ECD-7.i\080225.b\013.D

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD
Level 1	Level 2	Level 3	Level 4	Level 5	Level 6			
24 Aroclor-1016(1)	158840	159210	146484	133258	127241	123063	141349	11.187
(2)	310860	291860	260992	235770	224535	216610	256771	14.848
(3)	408820	386270	334092	310422	300047	292621	338712	14.231
(4)	293400	278730	252684	230108	219207	211584	247619	13.396
(5)	229680	214740	190444	172898	163516	156677	187993	15.539
25 Aroclor-1221(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
26 Aroclor-1232(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
27 Aroclor-1242(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
28 Aroclor-1248(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
29 Aroclor-1254(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuares  
 Curve Type : Average

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
	Level 1	Level 2	Level 3	Level 4	Level 5	Level 6			
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
30 Aroclor-1260(1)	435960	398870	352160	317264	304503	297008	350961	15.980	
(2)	662140	594040	528220	479210	464583	454213	530401	15.585	
(3)	338000	311930	278716	250210	239115	233383	275226	15.399	
(4)	393520	363710	328700	295740	284957	280092	324453	14.246	
(5)	800000	720480	655308	600802	587904	582351	657808	13.250	
41 Aroclor-1268(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
\$ 1 Tetrachloro-m-Xylene	8170200	7632900	7121200	6786120	6713173	6662370	7180994	8.425	
\$ 33 Decachlorobiphenyl (DCB)	7602000	6638300	6236720	5612620	5363707	5408550	6143649	14.210	

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i      Injection Date: 26-FEB-2008 09:15  
Lab File ID: 034.D      Init. Cal. Date(s): 25-FEB-2008    25-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    18:27      21:18  
Lab Sample ID: AR1660-CCV    Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m

COMPOUND	RRF / AMOUNT	RFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1 Tetrachloro-m-Xylene	7180994	7034200	0.010	2.04420	15.00000	Averaged
24 Aroclor-1016(1)	141349	147488	0.010	-4.34286	15.00000	Averaged
(2)	256771	263304	0.010	-2.54425	15.00000	Averaged
(3)	338712	341120	0.010	-0.71094	15.00000	Averaged
(4)	247619	250792	0.010	-1.28149	15.00000	Averaged
(5)	187993	189168	0.010	-0.62529	15.00000	Averaged
30 Aroclor-1260(1)	350961	352584	0.010	-0.46251	15.00000	Averaged
(2)	530401	525912	0.010	0.84633	15.00000	Averaged
(3)	275226	279064	0.010	-1.39463	15.00000	Averaged
(4)	324453	329316	0.010	-1.49876	15.00000	Averaged
(5)	657808	654848	0.010	0.44990	15.00000	Averaged
33 Decachlorobiphenyl (DCB)	6143649	6148040	0.010	-0.07146	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i Injection Date: 26-FEB-2008 20:03  
Lab File ID: 053.D Init. Cal. Date(s): 25-FEB-2008 25-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 18:27 21:18  
Lab Sample ID: AR1660-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m

COMPOUND	RRF / AMOUNT	MIN		MAX		CURVE TYPE
		RF0.500	RRF %D / %DRIFT	%D / %DRIFT		
1 Tetrachloro-m-Xylene	7180994	7195880	0.010	-0.20730	15.00000	Averaged
24 Aroclor-1016(1)	141349	149932	0.010	-6.07191	15.00000	Averaged
(2)	256771	267300	0.010	-4.10050	15.00000	Averaged
(3)	338712	341460	0.010	-0.81133	15.00000	Averaged
(4)	247619	252168	0.010	-1.83719	15.00000	Averaged
(5)	187993	192216	0.010	-2.24663	15.00000	Averaged
30 Aroclor-1260(1)	350961	361564	0.010	-3.02120	15.00000	Averaged
(2)	530401	539064	0.010	-1.63330	15.00000	Averaged
(3)	275226	286664	0.010	-4.15600	15.00000	Averaged
(4)	324453	336916	0.010	-3.84116	15.00000	Averaged
(5)	657808	671424	0.010	-2.06998	15.00000	Averaged
33 Decachlorobiphenyl (DCB)	6143649	6398480	0.010	-4.14787	15.00000	Averaged

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuarez  
 Curve Type : Average

## Calibration File Names:

Level 1: \\Nitro\chem\ECD-7.i\080225.b\080225.b\008.D  
 Level 2: \\Nitro\chem\ECD-7.i\080225.b\080225.b\009.D  
 Level 3: \\Nitro\chem\ECD-7.i\080225.b\080225.b\010.D  
 Level 4: \\Nitro\chem\ECD-7.i\080225.b\080225.b\011.D  
 Level 5: \\Nitro\chem\ECD-7.i\080225.b\080225.b\012.D  
 Level 6: \\Nitro\chem\ECD-7.i\080225.b\080225.b\013.D

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
Level 1	Level 2	Level 3	Level 4	Level 5	Level 6				
24 Aroclor-1016(1)	188840	173810	160312	151714	148364	143570	161102	10.713	
(2)	389440	365910	331688	304708	293963	285983	328615	12.686	
(3)	495640	471650	418528	394776	391996	380247	425473	11.130	
(4)	346180	342590	296512	269896	259909	257690	295463	13.655	
(5)	279820	264950	236324	218764	210175	204070	235684	13.066	
25 Aroclor-1221(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
26 Aroclor-1232(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
27 Aroclor-1242(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
28 Aroclor-1248(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
29 Aroclor-1254(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuares  
 Curve Type : Average

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
	Level 1	Level 2	Level 3	Level 4	Level 5	Level 6			
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
30 Aroclor-1260(1)	567080	523680	461776	423508	411521	399843	464568	14.504	
(2)	664040	607800	538796	501720	490820	478908	547014	13.510	
(3)	437600	407420	360736	334666	324281	318156	363810	13.383	
(4)	473600	429170	392640	363974	355959	348920	394044	12.410	
(5)	976180	895200	839180	787730	780368	775746	842401	9.493	
41 Aroclor-1268(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
\$ 1 Tetrachloro-m-Xylene	8765400	8524000	8383480	8206820	8182640	8157320	8369943	2.863	
\$ 33 Decachlorobiphenyl (DCB)	9036200	8137400	7697400	6931260	6726533	6806400	7555866	12.114	



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i Injection Date: 26-FEB-2008 09:15  
Lab File ID: 034.D Init. Cal. Date(s): 25-FEB-2008 25-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 18:27 21:18  
Lab Sample ID: AR1660-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m

COMPOUND	RRF / AMOUNT	MIN		MAX		CURVE TYPE
		RFO.500	RRF	%D / %DRIFT	%D / %DRIFT	
1\$ 1 Tetrachloro-m-Xylene	8369943	7717080	0.010	7.80009	15.00000	Averaged
24 Aroclor-1016(1)	161102	152524	0.010	5.32438	15.00000	Averaged
(2)	328615	312224	0.010	4.98798	15.00000	Averaged
(3)	425473	405392	0.010	4.71965	15.00000	Averaged
(4)	295463	282664	0.010	4.33181	15.00000	Averaged
(5)	235684	229000	0.010	2.83591	15.00000	Averaged
30 Aroclor-1260(1)	464568	439964	0.010	5.29611	15.00000	Averaged
(2)	547014	516992	0.010	5.48834	15.00000	Averaged
(3)	363810	346632	0.010	4.72167	15.00000	Averaged
(4)	394044	373140	0.010	5.30494	15.00000	Averaged
(5)	842401	790092	0.010	6.20948	15.00000	Averaged
33 Decachlorobiphenyl (DCB)	7555866	7187520	0.010	4.87496	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i Injection Date: 26-FEB-2008 20:03  
Lab File ID: 053.D Init. Cal. Date(s): 25-FEB-2008 25-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 18:27 21:18  
Lab Sample ID: AR1660-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m

COMPOUND	RRF / AMOUNT	MIN		MAX		CURVE TYPE
		RFO.500	RRF	%D / %DRIFT	%D / %DRIFT	
\$ 1 Tetrachloro-m-Xylene	8369943	7609760	0.010	9.08230	15.00000	Averaged
24 Aroclor-1016(1)	161102	152096	0.010	5.59005	15.00000	Averaged
(2)	328615	309240	0.010	5.89604	15.00000	Averaged
(3)	425473	395192	0.010	7.11698	15.00000	Averaged
(4)	295463	278164	0.010	5.85484	15.00000	Averaged
(5)	235684	226188	0.010	4.02903	15.00000	Averaged
30 Aroclor-1260(1)	464568	437796	0.010	5.76278	15.00000	Averaged
(2)	547014	511096	0.010	6.56619	15.00000	Averaged
(3)	363810	345776	0.010	4.95695	15.00000	Averaged
(4)	394044	372612	0.010	5.43893	15.00000	Averaged
(5)	842401	788956	0.010	6.34433	15.00000	Averaged
\$ 33 Decachlorobiphenyl (DCB)	7555866	7272560	0.010	3.74948	15.00000	Averaged

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802318

Instrument ID: FID-2

Calibration Date(s): 02/18/08 02/19/08

Column:

ID: 2.00 (mm)

Calibration Time(s): 1455 0655

LAB FILE ID:

RF10: 016

RF50: 017

RF100: 018

RF250: 019

RF500: 020

COMPOUND	RF10	RF50	RF100	RF250	RF500
TPH-ORO (>C28-C35)	2410.000	1820.860	1920.020	1804.828	1577.508
TPH-DRO (>C10-C28)	2410.000	1820.860	1920.020	1804.828	1577.508
TPH-GRO (C6-C10)	2074.300	1871.040	1309.020	1221.916	1096.358
2-Fluorobiphenyl	1088.600	1268.100	1149.840	1445.700	1377.340

FORM VI TPH

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802318

Instrument ID: FID-2

Calibration Date(s): 02/18/08 02/19/08

Column:

ID: 2.00 (mm)

Calibration Time(s): 1455

0655

LAB FILE ID:

RF1000: 021

RF2000: 008

COMPOUND	RF1000	RF2000
TPH-ORO (>C28-C35)	1683.375	1825.634
TPH-DRO (>C10-C28)	1683.375	1825.634
TPH-GRO (C6-C10)	1088.556	1061.624
2-Fluorobiphenyl	1316.250	

FORM VI TPH

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802318

Instrument ID: FID-2 Calibration Date(s): 02/18/08 02/19/08

Column: ID: 2.00 (mm) Calibration Time(s): 1455 0655

COMPOUND	CURVE	COEFFICIENTS		%RSD OR R^2
		A0	A1	
TPH-ORO (>C28-C35)	AVRG		1863.17507	14.2
TPH-DRO (>C10-C28)	AVRG		1863.17507	14.2
TPH-GRO (C6-C10)	LINR	-28.205917	9.529e-004	1.000
2-Fluorobiphenyl	AVRG		1274.30500	10.6

FORM VI TPH

FORM 7  
TPH CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802318

Instrument ID: FID-2 Calibration Date: 02/21/08 Time: 2134

Lab File ID: 037 Init. Calib. Date(s): 02/18/08 02/19/08

Init. Calib. Times: 1455 0655

GC Column: ID: 2.00 (mm)

COMPOUND	SAMPLE AMOUNT	CAL100 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
C6-C12	236.170	250.000	LINR	5.5	25.0
>C12-C28	236.860	250.000	AVRG	5.2	25.0
<del>C28-C35</del>	<del>0.000</del>	<del>250.000</del>	<del>AVRG</del>	<del>100.0</del>	<del>25.0</del>
=====	=====	=====	=====	=====	=====
Trifluoromethyl benzene	48.387	50.000	AVRG	3.2	25.0
2-Fluorobiphenyl	52.671	50.000	AVRG	5.3	25.0

FORM VII TPH

FORM 7  
TPH CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802318

Instrument ID: FID-2 Calibration Date: 02/22/08 Time: 1327

Lab File ID: 056 Init. Calib. Date(s): 02/18/08 02/19/08

Init. Calib. Times: 1455 0655

GC Column: ID: 2.00 (mm)

COMPOUND	SAMPLE AMOUNT	CAL100 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
C6-C12	273.834	250.000	LINR	9.5	25.0
>C12-C28	294.192	250.000	AVRG	17.7	25.0
<del>C28-C35</del>	<del>0.000</del>	<del>250.000</del>	<del>AVRG</del>	<del>100.0</del>	<del>25.0</del>
=====	=====	=====	=====	=====	=====
Trifluoromethyl benzene	52.548	50.000	AVRG	5.1	25.0
2-Fluorobiphenyl	58.362	50.000	AVRG	16.7	25.0
=====	=====	=====	=====	=====	=====

FORM VII TPH

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	98.77	98.77	97.15	97.15	P
Antimony	100.0	103.40	103.4	100.0	94.89	94.89	94.70	94.7	P
Arsenic	100.0	98.49	98.49	100.0	99.99	99.99	98.52	98.52	P
Barium	100.0	100.00	100	100.0	100.90	100.9	101.20	101.2	P
Beryllium	100.0	99.36	99.36	100.0	100.10	100.1	98.64	98.64	P
Boron	500.0	526.60	105.32	500.0	497.00	99.4	492.70	98.54	P
Cadmium	100.0	100.10	100.1	100.0	100.70	100.7	100.80	100.8	P
Calcium	10000.0	10260.00	102.6	10000.0	10310.00	103.1	9769.00	97.69	P
Chromium	100.0	97.92	97.92	100.0	99.65	99.65	100.20	100.2	P
Cobalt	100.0	100.40	100.4	100.0	99.79	99.79	99.71	99.71	P
Copper	100.0	102.40	102.4	100.0	101.70	101.7	99.15	99.15	P
Iron	10000.0	10010.00	100.1	10000.0	10200.00	102	10020.00	100.2	P
Lead	100.0	102.40	102.4	100.0	102.30	102.3	100.70	100.7	P
Magnesium	10000.0	9905.00	99.05	10000.0	10220.00	102.2	10020.00	100.2	P
Manganese	100.0	98.36	98.36	100.0	99.96	99.96	100.80	100.8	P
Molybdenum	100.0	101.00	101	100.0	102.40	102.4	100.40	100.4	P
Nickel	100.0	102.20	102.2	100.0	99.82	99.82	100.10	100.1	P
Potassium	10000.0	9853.00	98.53	10000.0	10090.00	100.9	10030.00	100.3	P
Selenium	100.0	99.30	99.3	100.0	103.10	103.1	100.90	100.9	P
Silver	100.0	104.50	104.5	100.0	103.00	103	102.20	102.2	P
Sodium	10000.0	9735.00	97.35	10000.0	9935.00	99.35	9901.00	99.01	P
Strontium	100.0	100.30	100.3	100.0	102.50	102.5	102.30	102.3	P
Thallium	100.0	98.79	98.79	100.0	100.70	100.7	99.80	99.8	P
Tin	100.0	106.30	106.3	100.0	103.50	103.5	103.10	103.1	P
Titanium	100.0	101.30	101.3	100.0	99.28	99.28	99.80	99.8	P
Vanadium	100.0	100.40	100.4	100.0	99.12	99.12	101.20	101.2	P
Zinc	100.0	99.05	99.05	100.0	99.02	99.02	98.22	98.22	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN



2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	108.90	108.9	115.60	115.6	P
Antimony	100.0	103.40	103.4	100.0	92.31	92.31	100.30	100.3	P
Arsenic	100.0	98.49	98.49	100.0	96.93	96.93	99.22	99.22	P
Barium	100.0	100.00	100	100.0	99.24	99.24	99.78	99.78	P
Beryllium	100.0	99.36	99.36	100.0	97.16	97.16	97.99	97.99	P
Boron	500.0	526.60	105.32	500.0	481.00	96.2	485.00	97	P
Cadmium	100.0	100.10	100.1	100.0	99.18	99.18	98.75	98.75	P
Calcium	10000.0	10260.00	102.6	10000.0	9881.00	98.81	10790.00	107.9	P
Chromium	100.0	97.92	97.92	100.0	97.99	97.99	99.34	99.34	P
Cobalt	100.0	100.40	100.4	100.0	95.71	95.71	95.87	95.87	P
Copper	100.0	102.40	102.4	100.0	95.52	95.52	96.91	96.91	P
Iron	10000.0	10010.00	100.1	10000.0	9870.00	98.7	9931.00	99.31	P
Lead	100.0	102.40	102.4	100.0	100.20	100.2	98.80	98.8	P
Magnesium	10000.0	9905.00	99.05	10000.0	10110.00	101.1	10400.00	104	P
Manganese	100.0	98.36	98.36	100.0	99.93	99.93	101.80	101.8	P
Molybdenum	100.0	101.00	101	100.0	98.03	98.03	96.91	96.91	P
Nickel	100.0	102.20	102.2	100.0	94.49	94.49	97.15	97.15	P
Potassium	10000.0	9853.00	98.53	10000.0	10170.00	101.7	10480.00	104.8	P
Selenium	100.0	99.30	99.3	100.0	100.30	100.3	102.20	102.2	P
Silver	100.0	104.50	104.5	100.0	98.83	98.83	98.07	98.07	P
Sodium	10000.0	9735.00	97.35	10000.0	9844.00	98.44	10100.00	101	P
Strontium	100.0	100.30	100.3	100.0	103.10	103.1	103.00	103	P
Thallium	100.0	98.79	98.79	100.0	98.74	98.74	97.84	97.84	P
Tin	100.0	106.30	106.3	100.0	99.86	99.86	99.58	99.58	P
Titanium	100.0	101.30	101.3	100.0	98.57	98.57	98.96	98.96	P
Vanadium	100.0	100.40	100.4	100.0	98.91	98.91	100.30	100.3	P
Zinc	100.0	99.05	99.05	100.0	95.98	95.98	96.80	96.8	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	119.80	119.8	114.60	114.6	P
Antimony	100.0	103.40	103.4	100.0	93.51	93.51	92.53	92.53	P
Arsenic	100.0	98.49	98.49	100.0	96.69	96.69	95.40	95.4	P
Barium	100.0	100.00	100	100.0	98.98	98.98	98.87	98.87	P
Beryllium	100.0	99.36	99.36	100.0	96.89	96.89	94.49	94.49	P
Boron	500.0	526.60	105.32	500.0	484.50	96.9	477.80	95.56	P
Cadmium	100.0	100.10	100.1	100.0	99.06	99.06	97.25	97.25	P
Calcium	10000.0	10260.00	102.6	10000.0	10250.00	102.5	10470.00	104.7	P
Chromium	100.0	97.92	97.92	100.0	96.46	96.46	95.78	95.78	P
Cobalt	100.0	100.40	100.4	100.0	95.98	95.98	95.25	95.25	P
Copper	100.0	102.40	102.4	100.0	95.15	95.15	94.55	94.55	P
Iron	10000.0	10010.00	100.1	10000.0	9746.00	97.46	9652.00	96.52	P
Lead	100.0	102.40	102.4	100.0	100.90	100.9	101.00	101	P
Magnesium	10000.0	9905.00	99.05	10000.0	10100.00	101	10240.00	102.4	P
Manganese	100.0	98.36	98.36	100.0	99.36	99.36	98.22	98.22	P
Molybdenum	100.0	101.00	101	100.0	93.66	93.66	94.18	94.18	P
Nickel	100.0	102.20	102.2	100.0	95.09	95.09	95.95	95.95	P
Potassium	10000.0	9853.00	98.53	10000.0	10210.00	102.1	10350.00	103.5	P
Selenium	100.0	99.30	99.3	100.0	98.52	98.52	98.72	98.72	P
Silver	100.0	104.50	104.5	100.0	97.80	97.8	96.88	96.88	P
Sodium	10000.0	9735.00	97.35	10000.0	9705.00	97.05	9892.00	98.92	P
Strontium	100.0	100.30	100.3	100.0	101.90	101.9	102.10	102.1	P
Thallium	100.0	98.79	98.79	100.0	97.90	97.9	95.92	95.92	P
Tin	100.0	106.30	106.3	100.0	101.50	101.5	100.60	100.6	P
Titanium	100.0	101.30	101.3	100.0	101.80	101.8	100.20	100.2	P
Vanadium	100.0	100.40	100.4	100.0	100.40	100.4	99.56	99.56	P
Zinc	100.0	99.05	99.05	100.0	93.64	93.64	93.26	93.26	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	115.20	115.2	115.30	115.3	P
Antimony	100.0	103.40	103.4	100.0	93.09	93.09	96.39	96.39	P
Arsenic	100.0	98.49	98.49	100.0	96.89	96.89	96.78	96.78	P
Barium	100.0	100.00	100	100.0	97.78	97.78	99.01	99.01	P
Beryllium	100.0	99.36	99.36	100.0	96.39	96.39	96.22	96.22	P
Boron	500.0	526.60	105.32	500.0	487.70	97.54	504.90	100.98	P
Cadmium	100.0	100.10	100.1	100.0	97.43	97.43	97.84	97.84	P
Calcium	10000.0	10260.00	102.6	10000.0	10830.00	108.3	10770.00	107.7	P
Chromium	100.0	97.92	97.92	100.0	95.29	95.29	96.41	96.41	P
Cobalt	100.0	100.40	100.4	100.0	94.40	94.4	94.84	94.84	P
Copper	100.0	102.40	102.4	100.0	94.03	94.03	95.49	95.49	P
Iron	10000.0	10010.00	100.1	10000.0	9676.00	96.76	9780.00	97.8	P
Lead	100.0	102.40	102.4	100.0	101.30	101.3	101.30	101.3	P
Magnesium	10000.0	9905.00	99.05	10000.0	9892.00	98.92	10080.00	100.8	P
Manganese	100.0	98.36	98.36	100.0	98.63	98.63	99.14	99.14	P
Molybdenum	100.0	101.00	101	100.0	93.30	93.3	94.00	94	P
Nickel	100.0	102.20	102.2	100.0	94.42	94.42	95.61	95.61	P
Potassium	10000.0	9853.00	98.53	10000.0	10310.00	103.1	10560.00	105.6	P
Selenium	100.0	99.30	99.3	100.0	97.34	97.34	100.60	100.6	P
Silver	100.0	104.50	104.5	100.0	96.16	96.16	97.22	97.22	P
Sodium	10000.0	9735.00	97.35	10000.0	9564.00	95.64	9823.00	98.23	P
Strontium	100.0	100.30	100.3	100.0	103.60	103.6	103.80	103.8	P
Thallium	100.0	98.79	98.79	100.0	97.46	97.46	98.52	98.52	P
Tin	100.0	106.30	106.3	100.0	100.20	100.2	100.40	100.4	P
Titanium	100.0	101.30	101.3	100.0	100.30	100.3	101.10	101.1	P
Vanadium	100.0	100.40	100.4	100.0	99.69	99.69	100.00	100	P
Zinc	100.0	99.05	99.05	100.0	90.32	90.32	90.35	90.35	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	101.10	101.1	110.40	110.4	P
Antimony	100.0	103.40	103.4	100.0	96.99	96.99	96.20	96.2	P
Arsenic	100.0	98.49	98.49	100.0	96.94	96.94	101.00	101	P
Barium	100.0	100.00	100	100.0	101.10	101.1	102.30	102.3	P
Beryllium	100.0	99.36	99.36	100.0	100.50	100.5	101.60	101.6	P
Boron	500.0	526.60	105.32	500.0	506.40	101.28	505.10	101.02	P
Cadmium	100.0	100.10	100.1	100.0	100.80	100.8	101.60	101.6	P
Calcium	10000.0	10260.00	102.6	10000.0	10040.00	100.4	9754.00	97.54	P
Chromium	100.0	97.92	97.92	100.0	97.45	97.45	101.30	101.3	P
Cobalt	100.0	100.40	100.4	100.0	102.00	102	102.50	102.5	P
Copper	100.0	102.40	102.4	100.0	102.30	102.3	103.40	103.4	P
Iron	10000.0	10010.00	100.1	10000.0	9901.00	99.01	10060.00	100.6	P
Lead	100.0	102.40	102.4	100.0	102.10	102.1	101.70	101.7	P
Magnesium	10000.0	9905.00	99.05	10000.0	9954.00	99.54	10160.00	101.6	P
Manganese	100.0	98.36	98.36	100.0	98.52	98.52	102.00	102	P
Molybdenum	100.0	101.00	101	100.0	99.98	99.98	101.10	101.1	P
Nickel	100.0	102.20	102.2	100.0	100.80	100.8	102.70	102.7	P
Potassium	10000.0	9853.00	98.53	10000.0	9942.00	99.42	10160.00	101.6	P
Selenium	100.0	99.30	99.3	100.0	97.44	97.44	98.46	98.46	P
Silver	100.0	104.50	104.5	100.0	104.40	104.4	102.80	102.8	P
Sodium	10000.0	9735.00	97.35	10000.0	9835.00	98.35	10150.00	101.5	P
Strontium	100.0	100.30	100.3	100.0	100.10	100.1	101.10	101.1	P
Thallium	100.0	98.79	98.79	100.0	99.53	99.53	99.31	99.31	P
Tin	100.0	106.30	106.3	100.0	105.50	105.5	100.70	100.7	P
Titanium	100.0	101.30	101.3	100.0	102.60	102.6	105.80	105.8	P
Vanadium	100.0	100.40	100.4	100.0	99.79	99.79	100.80	100.8	P
Zinc	100.0	99.05	99.05	100.0	99.88	99.88	102.90	102.9	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	125.50	125.5	97.16	97.16	P
Antimony	100.0	103.40	103.4	100.0	92.46	92.46	92.47	92.47	P
Arsenic	100.0	98.49	98.49	100.0	98.64	98.64	97.47	97.47	P
Barium	100.0	100.00	100	100.0	100.60	100.6	93.64	93.64	P
Beryllium	100.0	99.36	99.36	100.0	101.50	101.5	92.89	92.89	P
Boron	500.0	526.60	105.32	500.0	506.40	101.28	455.40	91.08	P
Cadmium	100.0	100.10	100.1	100.0	100.60	100.6	92.68	92.68	P
Calcium	10000.0	10260.00	102.6	10000.0	9776.00	97.76	9529.00	95.29	P
Chromium	100.0	97.92	97.92	100.0	97.46	97.46	97.63	97.63	P
Cobalt	100.0	100.40	100.4	100.0	101.20	101.2	99.09	99.09	P
Copper	100.0	102.40	102.4	100.0	103.00	103	95.20	95.2	P
Iron	10000.0	10010.00	100.1	10000.0	9826.00	98.26	9432.00	94.32	P
Lead	100.0	102.40	102.4	100.0	101.90	101.9	92.64	92.64	P
Magnesium	10000.0	9905.00	99.05	10000.0	9909.00	99.09	9363.00	93.63	P
Manganese	100.0	98.36	98.36	100.0	99.36	99.36	97.87	97.87	P
Molybdenum	100.0	101.00	101	100.0	99.19	99.19	93.22	93.22	P
Nickel	100.0	102.20	102.2	100.0	102.30	102.3	94.16	94.16	P
Potassium	10000.0	9853.00	98.53	10000.0	10040.00	100.4	9461.00	94.61	P
Selenium	100.0	99.30	99.3	100.0	99.57	99.57	94.87	94.87	P
Silver	100.0	104.50	104.5	100.0	104.70	104.7	95.35	95.35	P
Sodium	10000.0	9735.00	97.35	10000.0	9847.00	98.47	9408.00	94.08	P
Strontium	100.0	100.30	100.3	100.0	101.10	101.1	94.10	94.1	P
Thallium	100.0	98.79	98.79	100.0	99.44	99.44	92.67	92.67	P
Tin	100.0	106.30	106.3	100.0	106.30	106.3	93.93	93.93	P
Titanium	100.0	101.30	101.3	100.0	102.00	102	93.67	93.67	P
Vanadium	100.0	100.40	100.4	100.0	101.00	101	98.74	98.74	P
Zinc	100.0	99.05	99.05	100.0	100.00	100	98.05	98.05	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	111.60	111.6	114.80	114.8	P
Antimony	100.0	103.40	103.4	100.0	95.84	95.84	98.30	98.3	P
Arsenic	100.0	98.49	98.49	100.0	100.70	100.7	103.40	103.4	P
Barium	100.0	100.00	100	100.0	100.20	100.2	102.30	102.3	P
Beryllium	100.0	99.36	99.36	100.0	99.99	99.99	101.90	101.9	P
Boron	500.0	526.60	105.32	500.0	497.30	99.46	509.00	101.8	P
Cadmium	100.0	100.10	100.1	100.0	101.80	101.8	100.70	100.7	P
Calcium	10000.0	10260.00	102.6	10000.0	10520.00	105.2	10050.00	100.5	P
Chromium	100.0	97.92	97.92	100.0	100.80	100.8	102.70	102.7	P
Cobalt	100.0	100.40	100.4	100.0	102.20	102.2	103.20	103.2	P
Copper	100.0	102.40	102.4	100.0	103.90	103.9	103.80	103.8	P
Iron	10000.0	10010.00	100.1	10000.0	10170.00	101.7	10300.00	103	P
Lead	100.0	102.40	102.4	100.0	101.00	101	100.20	100.2	P
Magnesium	10000.0	9905.00	99.05	10000.0	10430.00	104.3	10370.00	103.7	P
Manganese	100.0	98.36	98.36	100.0	101.60	101.6	103.50	103.5	P
Molybdenum	100.0	101.00	101	100.0	101.30	101.3	100.60	100.6	P
Nickel	100.0	102.20	102.2	100.0	103.70	103.7	103.50	103.5	P
Potassium	10000.0	9853.00	98.53	10000.0	10420.00	104.2	10510.00	105.1	P
Selenium	100.0	99.30	99.3	100.0	102.60	102.6	104.70	104.7	P
Silver	100.0	104.50	104.5	100.0	104.10	104.1	103.60	103.6	P
Sodium	10000.0	9735.00	97.35	10000.0	10430.00	104.3	10400.00	104	P
Strontium	100.0	100.30	100.3	100.0	102.40	102.4	102.70	102.7	P
Thallium	100.0	98.79	98.79	100.0	101.60	101.6	100.50	100.5	P
Tin	100.0	106.30	106.3	100.0	103.20	103.2	102.50	102.5	P
Titanium	100.0	101.30	101.3	100.0	101.80	101.8	105.80	105.8	P
Vanadium	100.0	100.40	100.4	100.0	102.70	102.7	103.10	103.1	P
Zinc	100.0	99.05	99.05	100.0	103.80	103.8	106.10	106.1	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	95.40	95.4	98.62	98.62	P
Antimony	100.0	94.79	94.79	100.0	96.23	96.23	96.28	96.28	P
Arsenic	100.0	96.28	96.28	100.0	97.18	97.18	97.59	97.59	P
Barium	100.0	99.64	99.64	100.0	97.00	97	101.80	101.8	P
Beryllium	100.0	98.99	98.99	100.0	97.33	97.33	98.41	98.41	P
Boron	500.0	519.80	103.96	500.0	480.80	96.16	485.00	97	P
Cadmium	100.0	100.20	100.2	100.0	98.72	98.72	101.70	101.7	P
Calcium	10000.0	9632.00	96.32	10000.0	9669.00	96.69	9923.00	99.23	P
Chromium	100.0	96.50	96.5	100.0	96.47	96.47	97.32	97.32	P
Cobalt	100.0	99.74	99.74	100.0	97.01	97.01	98.41	98.41	P
Copper	100.0	100.70	100.7	100.0	99.28	99.28	100.60	100.6	P
Iron	10000.0	9781.00	97.81	10000.0	9852.00	98.52	9987.00	99.87	P
Lead	100.0	102.90	102.9	100.0	98.66	98.66	101.30	101.3	P
Magnesium	10000.0	9861.00	98.61	10000.0	9840.00	98.4	9983.00	99.83	P
Manganese	100.0	97.42	97.42	100.0	98.20	98.2	100.10	100.1	P
Molybdenum	100.0	97.99	97.99	100.0	97.84	97.84	98.54	98.54	P
Nickel	100.0	99.96	99.96	100.0	98.04	98.04	100.10	100.1	P
Potassium	10000.0	9685.00	96.85	10000.0	9753.00	97.53	9865.00	98.65	P
Selenium	100.0	97.35	97.35	100.0	102.00	102	101.90	101.9	P
Silver	100.0	102.60	102.6	100.0	100.10	100.1	99.87	99.87	P
Sodium	10000.0	9801.00	98.01	10000.0	9689.00	96.89	9880.00	98.8	P
Strontium	100.0	98.14	98.14	100.0	97.74	97.74	99.39	99.39	P
Thallium	100.0	100.50	100.5	100.0	98.50	98.5	100.70	100.7	P
Tin	100.0	103.20	103.2	100.0	97.53	97.53	98.39	98.39	P
Titanium	100.0	99.87	99.87	100.0	98.08	98.08	100.20	100.2	P
Vanadium	100.0	99.33	99.33	100.0	98.85	98.85	98.45	98.45	P
Zinc	100.0	99.32	99.32	100.0	98.73	98.73	96.95	96.95	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	100.90	100.9	94.88	94.88	P
Antimony	100.0	94.79	94.79	100.0	97.26	97.26	96.66	96.66	P
Arsenic	100.0	96.28	96.28	100.0	97.23	97.23	94.47	94.47	P
Barium	100.0	99.64	99.64	100.0	100.90	100.9	97.15	97.15	P
Beryllium	100.0	98.99	98.99	100.0	98.74	98.74	94.73	94.73	P
Boron	500.0	519.80	103.96	500.0	487.40	97.48	477.10	95.42	P
Cadmium	100.0	100.20	100.2	100.0	103.30	103.3	98.43	98.43	P
Calcium	10000.0	9632.00	96.32	10000.0	10030.00	100.3	9425.00	94.25	P
Chromium	100.0	96.50	96.5	100.0	98.86	98.86	94.66	94.66	P
Cobalt	100.0	99.74	99.74	100.0	98.99	98.99	94.98	94.98	P
Copper	100.0	100.70	100.7	100.0	100.80	100.8	96.11	96.11	P
Iron	10000.0	9781.00	97.81	10000.0	10150.00	101.5	9662.00	96.62	P
Lead	100.0	102.90	102.9	100.0	103.30	103.3	97.17	97.17	P
Magnesium	10000.0	9861.00	98.61	10000.0	10440.00	104.4	9603.00	96.03	P
Manganese	100.0	97.42	97.42	100.0	100.80	100.8	98.71	98.71	P
Molybdenum	100.0	97.99	97.99	100.0	100.30	100.3	94.98	94.98	P
Nickel	100.0	99.96	99.96	100.0	99.38	99.38	93.86	93.86	P
Potassium	10000.0	9685.00	96.85	10000.0	9987.00	99.87	9426.00	94.26	P
Selenium	100.0	97.35	97.35	100.0	104.10	104.1	97.74	97.74	P
Silver	100.0	102.60	102.6	100.0	103.00	103	97.41	97.41	P
Sodium	10000.0	9801.00	98.01	10000.0	10340.00	103.4	9591.00	95.91	P
Strontium	100.0	98.14	98.14	100.0	101.30	101.3	96.59	96.59	P
Thallium	100.0	100.50	100.5	100.0	101.60	101.6	95.66	95.66	P
Tin	100.0	103.20	103.2	100.0	101.50	101.5	96.41	96.41	P
Titanium	100.0	99.87	99.87	100.0	100.10	100.1	95.37	95.37	P
Vanadium	100.0	99.33	99.33	100.0	100.20	100.2	95.65	95.65	P
Zinc	100.0	99.32	99.32	100.0	99.52	99.52	95.74	95.74	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN



2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	108.30	108.3	110.30	110.3	P
Antimony	100.0	94.79	94.79	100.0	91.08	91.08	93.01	93.01	P
Arsenic	100.0	96.28	96.28	100.0	94.16	94.16	94.05	94.05	P
Barium	100.0	99.64	99.64	100.0	97.32	97.32	98.48	98.48	P
Beryllium	100.0	98.99	98.99	100.0	93.00	93	93.34	93.34	P
Boron	500.0	519.80	103.96	500.0	480.70	96.14	471.40	94.28	P
Cadmium	100.0	100.20	100.2	100.0	98.89	98.89	99.47	99.47	P
Calcium	10000.0	9632.00	96.32	10000.0	9283.00	92.83	9400.00	94	P
Chromium	100.0	96.50	96.5	100.0	94.06	94.06	92.81	92.81	P
Cobalt	100.0	99.74	99.74	100.0	96.07	96.07	95.04	95.04	P
Copper	100.0	100.70	100.7	100.0	96.38	96.38	97.21	97.21	P
Iron	10000.0	9781.00	97.81	10000.0	9470.00	94.7	9499.00	94.99	P
Lead	100.0	102.90	102.9	100.0	100.50	100.5	101.80	101.8	P
Magnesium	10000.0	9861.00	98.61	10000.0	9438.00	94.38	9284.00	92.84	P
Manganese	100.0	97.42	97.42	100.0	97.35	97.35	95.92	95.92	P
Molybdenum	100.0	97.99	97.99	100.0	93.96	93.96	94.21	94.21	P
Nickel	100.0	99.96	99.96	100.0	95.50	95.5	95.26	95.26	P
Potassium	10000.0	9685.00	96.85	10000.0	9379.00	93.79	9370.00	93.7	P
Selenium	100.0	97.35	97.35	100.0	96.41	96.41	98.22	98.22	P
Silver	100.0	102.60	102.6	100.0	100.30	100.3	100.50	100.5	P
Sodium	10000.0	9801.00	98.01	10000.0	9297.00	92.97	9144.00	91.44	P
Strontium	100.0	98.14	98.14	100.0	98.44	98.44	98.39	98.39	P
Thallium	100.0	100.50	100.5	100.0	98.09	98.09	98.37	98.37	P
Tin	100.0	103.20	103.2	100.0	101.40	101.4	101.80	101.8	P
Titanium	100.0	99.87	99.87	100.0	97.27	97.27	96.32	96.32	P
Vanadium	100.0	99.33	99.33	100.0	98.52	98.52	97.27	97.27	P
Zinc	100.0	99.32	99.32	100.0	94.15	94.15	92.79	92.79	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	109.60	109.6	95.34	95.34	P
Antimony	100.0	94.79	94.79	100.0	97.36	97.36	89.67	89.67	P
Arsenic	100.0	96.28	96.28	100.0	95.64	95.64	91.47	91.47	P
Barium	100.0	99.64	99.64	100.0	98.78	98.78	88.15	88.15	P
Beryllium	100.0	98.99	98.99	100.0	93.66	93.66	83.42	83.42	P
Boron	500.0	519.80	103.96	500.0	467.30	93.46	430.00	86	P
Cadmium	100.0	100.20	100.2	100.0	98.25	98.25	88.37	88.37	P
Calcium	10000.0	9632.00	96.32	10000.0	9537.00	95.37	8512.00	85.12	P
Chromium	100.0	96.50	96.5	100.0	93.84	93.84	88.88	88.88	P
Cobalt	100.0	99.74	99.74	100.0	94.03	94.03	91.22	91.22	P
Copper	100.0	100.70	100.7	100.0	95.92	95.92	83.03	83.03	P
Iron	10000.0	9781.00	97.81	10000.0	9634.00	96.34	8412.00	84.12	P
Lead	100.0	102.90	102.9	100.0	100.00	100	89.37	89.37	P
Magnesium	10000.0	9861.00	98.61	10000.0	9405.00	94.05	8103.00	81.03	P
Manganese	100.0	97.42	97.42	100.0	97.06	97.06	94.10	94.1	P
Molybdenum	100.0	97.99	97.99	100.0	96.03	96.03	84.64	84.64	P
Nickel	100.0	99.96	99.96	100.0	93.96	93.96	80.83	80.83	P
Potassium	10000.0	9685.00	96.85	10000.0	9586.00	95.86	8363.00	83.63	P
Selenium	100.0	97.35	97.35	100.0	99.57	99.57	88.80	88.8	P
Silver	100.0	102.60	102.6	100.0	97.25	97.25	89.51	89.51	P
Sodium	10000.0	9801.00	98.01	10000.0	9374.00	93.74	7938.00	79.38	P
Strontium	100.0	98.14	98.14	100.0	98.04	98.04	90.43	90.43	P
Thallium	100.0	100.50	100.5	100.0	97.16	97.16	86.40	86.4	P
Tin	100.0	103.20	103.2	100.0	96.58	96.58	93.76	93.76	P
Titanium	100.0	99.87	99.87	100.0	95.10	95.1	83.60	83.6	P
Vanadium	100.0	99.33	99.33	100.0	95.86	95.86	93.57	93.57	P
Zinc	100.0	99.32	99.32	100.0	94.42	94.42	89.65	89.65	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	105.40	105.4	103.10	103.1	P
Antimony	100.0	94.79	94.79	100.0	93.53	93.53	93.09	93.09	P
Arsenic	100.0	96.28	96.28	100.0	94.29	94.29	96.14	96.14	P
Barium	100.0	99.64	99.64	100.0	100.20	100.2	99.31	99.31	P
Beryllium	100.0	98.99	98.99	100.0	93.65	93.65	98.77	98.77	P
Boron	500.0	519.80	103.96	500.0	488.00	97.6	500.40	100.08	P
Cadmium	100.0	100.20	100.2	100.0	99.64	99.64	99.64	99.64	P
Calcium	10000.0	9632.00	96.32	10000.0	9373.00	93.73	9678.00	96.78	P
Chromium	100.0	96.50	96.5	100.0	92.79	92.79	94.74	94.74	P
Cobalt	100.0	99.74	99.74	100.0	93.37	93.37	99.08	99.08	P
Copper	100.0	100.70	100.7	100.0	91.90	91.9	99.84	99.84	P
Iron	10000.0	9781.00	97.81	10000.0	9428.00	94.28	9655.00	96.55	P
Lead	100.0	102.90	102.9	100.0	101.50	101.5	100.80	100.8	P
Magnesium	10000.0	9861.00	98.61	10000.0	8932.00	89.32	9805.00	98.05	P
Manganese	100.0	97.42	97.42	100.0	96.49	96.49	96.11	96.11	P
Molybdenum	100.0	97.99	97.99	100.0	94.14	94.14	96.34	96.34	P
Nickel	100.0	99.96	99.96	100.0	90.59	90.59	98.91	98.91	P
Potassium	10000.0	9685.00	96.85	10000.0	9235.00	92.35	9739.00	97.39	P
Selenium	100.0	97.35	97.35	100.0	97.98	97.98	96.27	96.27	P
Silver	100.0	102.60	102.6	100.0	97.76	97.76	102.50	102.5	P
Sodium	10000.0	9801.00	98.01	10000.0	8806.00	88.06	9592.00	95.92	P
Strontium	100.0	98.14	98.14	100.0	100.10	100.1	99.37	99.37	P
Thallium	100.0	100.50	100.5	100.0	98.17	98.17	97.55	97.55	P
Tin	100.0	103.20	103.2	100.0	102.60	102.6	104.70	104.7	P
Titanium	100.0	99.87	99.87	100.0	94.42	94.42	99.41	99.41	P
Vanadium	100.0	99.33	99.33	100.0	96.83	96.83	97.30	97.3	P
Zinc	100.0	99.32	99.32	100.0	93.26	93.26	98.07	98.07	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	113.00	113	91.96	91.96	P
Antimony	100.0	94.79	94.79	100.0	95.53	95.53	95.87	95.87	P
Arsenic	100.0	96.28	96.28	100.0	95.33	95.33	97.49	97.49	P
Barium	100.0	99.64	99.64	100.0	100.00	100	91.82	91.82	P
Beryllium	100.0	98.99	98.99	100.0	99.64	99.64	89.97	89.97	P
Boron	500.0	519.80	103.96	500.0	496.90	99.38	439.60	87.92	P
Cadmium	100.0	100.20	100.2	100.0	99.87	99.87	91.06	91.06	P
Calcium	10000.0	9632.00	96.32	10000.0	10300.00	103	9431.00	94.31	P
Chromium	100.0	96.50	96.5	100.0	95.08	95.08	96.61	96.61	P
Cobalt	100.0	99.74	99.74	100.0	95.72	95.72	97.21	97.21	P
Copper	100.0	100.70	100.7	100.0	99.49	99.49	92.36	92.36	P
Iron	10000.0	9781.00	97.81	10000.0	9891.00	98.91	9166.00	91.66	P
Lead	100.0	102.90	102.9	100.0	98.99	98.99	91.42	91.42	P
Magnesium	10000.0	9861.00	98.61	10000.0	10110.00	101.1	9475.00	94.75	P
Manganese	100.0	97.42	97.42	100.0	99.07	99.07	98.20	98.2	P
Molybdenum	100.0	97.99	97.99	100.0	95.96	95.96	90.69	90.69	P
Nickel	100.0	99.96	99.96	100.0	101.10	101.1	93.10	93.1	P
Potassium	10000.0	9685.00	96.85	10000.0	10340.00	103.4	9591.00	95.91	P
Selenium	100.0	97.35	97.35	100.0	99.09	99.09	91.79	91.79	P
Silver	100.0	102.60	102.6	100.0	97.66	97.66	90.74	90.74	P
Sodium	10000.0	9801.00	98.01	10000.0	10040.00	100.4	9360.00	93.6	P
Strontium	100.0	98.14	98.14	100.0	100.40	100.4	93.58	93.58	P
Thallium	100.0	100.50	100.5	100.0	96.12	96.12	89.64	89.64	P
Tin	100.0	103.20	103.2	100.0	97.02	97.02	89.86	89.86	P
Titanium	100.0	99.87	99.87	100.0	101.90	101.9	94.23	94.23	P
Vanadium	100.0	99.33	99.33	100.0	96.25	96.25	98.41	98.41	P
Zinc	100.0	99.32	99.32	100.0	96.56	96.56	97.79	97.79	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	105.70	105.7	100.30	100.3	P
Antimony	100.0	94.79	94.79	100.0	96.81	96.81	97.48	97.48	P
Arsenic	100.0	96.28	96.28	100.0	98.06	98.06	95.69	95.69	P
Barium	100.0	99.64	99.64	100.0	102.50	102.5	98.32	98.32	P
Beryllium	100.0	98.99	98.99	100.0	101.90	101.9	101.50	101.5	P
Boron	500.0	519.80	103.96	500.0	507.70	101.54	500.30	100.06	P
Cadmium	100.0	100.20	100.2	100.0	103.00	103	99.26	99.26	P
Calcium	10000.0	9632.00	96.32	10000.0	10700.00	107	9802.00	98.02	P
Chromium	100.0	96.50	96.5	100.0	98.02	98.02	96.44	96.44	P
Cobalt	100.0	99.74	99.74	100.0	98.10	98.1	96.61	96.61	P
Copper	100.0	100.70	100.7	100.0	103.60	103.6	101.10	101.1	P
Iron	10000.0	9781.00	97.81	10000.0	10400.00	104	9991.00	99.91	P
Lead	100.0	102.90	102.9	100.0	101.70	101.7	98.49	98.49	P
Magnesium	10000.0	9861.00	98.61	10000.0	10680.00	106.8	9906.00	99.06	P
Manganese	100.0	97.42	97.42	100.0	99.91	99.91	96.90	96.9	P
Molybdenum	100.0	97.99	97.99	100.0	100.90	100.9	97.40	97.4	P
Nickel	100.0	99.96	99.96	100.0	103.90	103.9	100.30	100.3	P
Potassium	10000.0	9685.00	96.85	10000.0	10770.00	107.7	9926.00	99.26	P
Selenium	100.0	97.35	97.35	100.0	104.80	104.8	100.20	100.2	P
Silver	100.0	102.60	102.6	100.0	100.70	100.7	100.50	100.5	P
Sodium	10000.0	9801.00	98.01	10000.0	10600.00	106	9855.00	98.55	P
Strontium	100.0	98.14	98.14	100.0	103.30	103.3	99.29	99.29	P
Thallium	100.0	100.50	100.5	100.0	100.70	100.7	97.89	97.89	P
Tin	100.0	103.20	103.2	100.0	99.39	99.39	99.00	99	P
Titanium	100.0	99.87	99.87	100.0	106.30	106.3	99.91	99.91	P
Vanadium	100.0	99.33	99.33	100.0	98.69	98.69	97.60	97.6	P
Zinc	100.0	99.32	99.32	100.0	96.99	96.99	98.65	98.65	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	100.60	100.6			P
Antimony	100.0	94.79	94.79	100.0	96.93	96.93			P
Arsenic	100.0	96.28	96.28	100.0	95.27	95.27			P
Barium	100.0	99.64	99.64	100.0	98.93	98.93			P
Beryllium	100.0	98.99	98.99	100.0	100.30	100.3			P
Boron	500.0	519.80	103.96	500.0	492.00	98.4			P
Cadmium	100.0	100.20	100.2	100.0	98.73	98.73			P
Calcium	10000.0	9632.00	96.32	10000.0	9620.00	96.2			P
Chromium	100.0	96.50	96.5	100.0	95.23	95.23			P
Cobalt	100.0	99.74	99.74	100.0	96.69	96.69			P
Copper	100.0	100.70	100.7	100.0	100.00	100			P
Iron	10000.0	9781.00	97.81	10000.0	9923.00	99.23			P
Lead	100.0	102.90	102.9	100.0	98.66	98.66			P
Magnesium	10000.0	9861.00	98.61	10000.0	9714.00	97.14			P
Manganese	100.0	97.42	97.42	100.0	96.06	96.06			P
Molybdenum	100.0	97.99	97.99	100.0	97.20	97.2			P
Nickel	100.0	99.96	99.96	100.0	99.58	99.58			P
Potassium	10000.0	9685.00	96.85	10000.0	9826.00	98.26			P
Selenium	100.0	97.35	97.35	100.0	99.75	99.75			P
Silver	100.0	102.60	102.6	100.0	101.00	101			P
Sodium	10000.0	9801.00	98.01	10000.0	9758.00	97.58			P
Strontium	100.0	98.14	98.14	100.0	99.62	99.62			P
Thallium	100.0	100.50	100.5	100.0	97.97	97.97			P
Tin	100.0	103.20	103.2	100.0	99.26	99.26			P
Titanium	100.0	99.87	99.87	100.0	100.10	100.1			P
Vanadium	100.0	99.33	99.33	100.0	96.54	96.54			P
Zinc	100.0	99.32	99.32	100.0	98.19	98.19			P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500\_080222A

Continuing Calibration Source:

Start: 2/22/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	101.90	101.9	100.0	91.87	91.87	93.79	93.79	P
Antimony	100.0	105.70	105.7	100.0	96.43	96.43	95.80	95.8	P
Arsenic	100.0	100.50	100.5	100.0	95.30	95.3	93.93	93.93	P
Barium	100.0	100.00	100	100.0	93.41	93.41	94.16	94.16	P
Beryllium	100.0	97.66	97.66	100.0	93.44	93.44	91.07	91.07	P
Boron	500.0	521.60	104.32	500.0	467.80	93.56	462.40	92.48	P
Cadmium	100.0	102.70	102.7	100.0	95.10	95.1	95.39	95.39	P
Calcium	10000.0	10230.00	102.3	10000.0	9411.00	94.11	9367.00	93.67	P
Chromium	100.0	100.90	100.9	100.0	96.51	96.51	95.76	95.76	P
Cobalt	100.0	104.10	104.1	100.0	97.59	97.59	94.88	94.88	P
Copper	100.0	103.40	103.4	100.0	95.38	95.38	93.86	93.86	P
Iron	10000.0	10080.00	100.8	10000.0	9480.00	94.8	9514.00	95.14	P
Lead	100.0	104.70	104.7	100.0	93.96	93.96	93.74	93.74	P
Magnesium	10000.0	10300.00	103	10000.0	9405.00	94.05	9772.00	97.72	P
Manganese	100.0	101.60	101.6	100.0	97.08	97.08	96.40	96.4	P
Molybdenum	100.0	104.80	104.8	100.0	95.59	95.59	95.16	95.16	P
Nickel	100.0	102.40	102.4	100.0	95.47	95.47	93.60	93.6	P
Potassium	10000.0	10000.00	100	10000.0	9408.00	94.08	9393.00	93.93	P
Selenium	100.0	99.62	99.62	100.0	97.24	97.24	96.28	96.28	P
Silver	100.0	105.00	105	100.0	96.49	96.49	96.24	96.24	P
Sodium	10000.0	10120.00	101.2	10000.0	9183.00	91.83	9627.00	96.27	P
Strontium	100.0	104.70	104.7	100.0	96.51	96.51	96.60	96.6	P
Thallium	100.0	100.80	100.8	100.0	94.52	94.52	94.19	94.19	P
Tin	100.0	109.10	109.1	100.0	95.30	95.3	94.97	94.97	P
Titanium	100.0	104.40	104.4	100.0	94.30	94.3	95.49	95.49	P
Vanadium	100.0	103.00	103	100.0	96.63	96.63	94.64	94.64	P
Zinc	100.0	101.00	101	100.0	93.83	93.83	93.58	93.58	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080222A

Continuing Calibration Source:

Start: 2/22/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	101.90	101.9	100.0	81.50	81.5	90.40	90.4	P
Antimony	100.0	105.70	105.7	100.0	96.40	96.4	102.70	102.7	P
Arsenic	100.0	100.50	100.5	100.0	91.61	91.61	94.85	94.85	P
Barium	100.0	100.00	100	100.0	83.39	83.39	93.68	93.68	P
Beryllium	100.0	97.66	97.66	100.0	81.02	81.02	88.15	88.15	P
Boron	500.0	521.60	104.32	500.0	414.80	82.96	455.50	91.1	P
Cadmium	100.0	102.70	102.7	100.0	85.45	85.45	94.99	94.99	P
Calcium	10000.0	10230.00	102.3	10000.0	8414.00	84.14	9229.00	92.29	P
Chromium	100.0	100.90	100.9	100.0	94.76	94.76	96.62	96.62	P
Cobalt	100.0	104.10	104.1	100.0	93.42	93.42	95.70	95.7	P
Copper	100.0	103.40	103.4	100.0	84.40	84.4	91.26	91.26	P
Iron	10000.0	10080.00	100.8	10000.0	8521.00	85.21	9388.00	93.88	P
Lead	100.0	104.70	104.7	100.0	83.40	83.4	93.27	93.27	P
Magnesium	10000.0	10300.00	103	10000.0	8789.00	87.89	9721.00	97.21	P
Manganese	100.0	101.60	101.6	100.0	96.81	96.81	98.35	98.35	P
Molybdenum	100.0	104.80	104.8	100.0	101.00	101	101.90	101.9	P
Nickel	100.0	102.40	102.4	100.0	82.73	82.73	90.14	90.14	P
Potassium	10000.0	10000.00	100	10000.0	8476.00	84.76	9299.00	92.99	P
Selenium	100.0	99.62	99.62	100.0	88.96	88.96	94.31	94.31	P
Silver	100.0	105.00	105	100.0	86.21	86.21	94.28	94.28	P
Sodium	10000.0	10120.00	101.2	10000.0	8713.00	87.13	9498.00	94.98	P
Strontium	100.0	104.70	104.7	100.0	87.35	87.35	95.72	95.72	P
Thallium	100.0	100.80	100.8	100.0	82.24	82.24	92.80	92.8	P
Tin	100.0	109.10	109.1	100.0	85.67	85.67	95.33	95.33	P
Titanium	100.0	104.40	104.4	100.0	85.09	85.09	93.94	93.94	P
Vanadium	100.0	103.00	103	100.0	95.43	95.43	96.83	96.83	P
Zinc	100.0	101.00	101	100.0	92.45	92.45	95.29	95.29	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN



2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080222A

Continuing Calibration Source:

Start: 2/22/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	101.90	101.9	100.0	94.97	94.97	96.33	96.33	P
Antimony	100.0	105.70	105.7	100.0	100.80	100.8	94.91	94.91	P
Arsenic	100.0	100.50	100.5	100.0	95.98	95.98	94.35	94.35	P
Barium	100.0	100.00	100	100.0	97.10	97.1	95.27	95.27	P
Beryllium	100.0	97.66	97.66	100.0	95.80	95.8	94.70	94.7	P
Boron	500.0	521.60	104.32	500.0	486.10	97.22	492.00	98.4	P
Cadmium	100.0	102.70	102.7	100.0	95.63	95.63	94.66	94.66	P
Calcium	10000.0	10230.00	102.3	10000.0	9953.00	99.53	9305.00	93.05	P
Chromium	100.0	100.90	100.9	100.0	98.65	98.65	94.88	94.88	P
Cobalt	100.0	104.10	104.1	100.0	99.23	99.23	95.80	95.8	P
Copper	100.0	103.40	103.4	100.0	95.86	95.86	92.64	92.64	P
Iron	10000.0	10080.00	100.8	10000.0	9569.00	95.69	9402.00	94.02	P
Lead	100.0	104.70	104.7	100.0	95.31	95.31	90.82	90.82	P
Magnesium	10000.0	10300.00	103	10000.0	9637.00	96.37	9208.00	92.08	P
Manganese	100.0	101.60	101.6	100.0	97.10	97.1	95.43	95.43	P
Molybdenum	100.0	104.80	104.8	100.0	96.24	96.24	90.87	90.87	P
Nickel	100.0	102.40	102.4	100.0	96.93	96.93	93.81	93.81	P
Potassium	10000.0	10000.00	100	10000.0	9622.00	96.22	9344.00	93.44	P
Selenium	100.0	99.62	99.62	100.0	97.87	97.87	91.83	91.83	P
Silver	100.0	105.00	105	100.0	97.45	97.45	94.61	94.61	P
Sodium	10000.0	10120.00	101.2	10000.0	9663.00	96.63	9271.00	92.71	P
Strontium	100.0	104.70	104.7	100.0	96.56	96.56	94.19	94.19	P
Thallium	100.0	100.80	100.8	100.0	94.89	94.89	91.31	91.31	P
Tin	100.0	109.10	109.1	100.0	97.38	97.38	95.40	95.4	P
Titanium	100.0	104.40	104.4	100.0	95.90	95.9	93.22	93.22	P
Vanadium	100.0	103.00	103	100.0	98.07	98.07	94.83	94.83	P
Zinc	100.0	101.00	101	100.0	97.22	97.22	93.73	93.73	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080222A

Continuing Calibration Source:

Start: 2/22/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	101.90	101.9	100.0	95.62	95.62	95.77	95.77	P
Antimony	100.0	105.70	105.7	100.0	101.20	101.2	102.20	102.2	P
Arsenic	100.0	100.50	100.5	100.0	95.81	95.81	98.31	98.31	P
Barium	100.0	100.00	100	100.0	94.50	94.5	95.69	95.69	P
Beryllium	100.0	97.66	97.66	100.0	95.88	95.88	96.86	96.86	P
Boron	500.0	521.60	104.32	500.0	501.70	100.34	490.80	98.16	P
Cadmium	100.0	102.70	102.7	100.0	94.82	94.82	94.27	94.27	P
Calcium	10000.0	10230.00	102.3	10000.0	9238.00	92.38	9579.00	95.79	P
Chromium	100.0	100.90	100.9	100.0	95.93	95.93	98.54	98.54	P
Cobalt	100.0	104.10	104.1	100.0	96.92	96.92	98.84	98.84	P
Copper	100.0	103.40	103.4	100.0	93.79	93.79	96.09	96.09	P
Iron	10000.0	10080.00	100.8	10000.0	9430.00	94.3	9652.00	96.52	P
Lead	100.0	104.70	104.7	100.0	92.11	92.11	93.74	93.74	P
Magnesium	10000.0	10300.00	103	10000.0	9344.00	93.44	9787.00	97.87	P
Manganese	100.0	101.60	101.6	100.0	95.95	95.95	98.85	98.85	P
Molybdenum	100.0	104.80	104.8	100.0	89.38	89.38	94.92	94.92	P
Nickel	100.0	102.40	102.4	100.0	94.61	94.61	95.88	95.88	P
Potassium	10000.0	10000.00	100	10000.0	9419.00	94.19	9726.00	97.26	P
Selenium	100.0	99.62	99.62	100.0	91.01	91.01	93.85	93.85	P
Silver	100.0	105.00	105	100.0	93.91	93.91	96.53	96.53	P
Sodium	10000.0	10120.00	101.2	10000.0	9376.00	93.76	9814.00	98.14	P
Strontium	100.0	104.70	104.7	100.0	94.05	94.05	96.09	96.09	P
Thallium	100.0	100.80	100.8	100.0	93.13	93.13	93.75	93.75	P
Tin	100.0	109.10	109.1	100.0	93.93	93.93	96.58	96.58	P
Titanium	100.0	104.40	104.4	100.0	94.61	94.61	95.28	95.28	P
Vanadium	100.0	103.00	103	100.0	95.82	95.82	98.79	98.79	P
Zinc	100.0	101.00	101	100.0	94.48	94.48	98.28	98.28	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080222A

Continuing Calibration Source:

Start: 2/22/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	101.90	101.9	100.0	96.16	96.16			P
Antimony	100.0	105.70	105.7	100.0	98.39	98.39			P
Arsenic	100.0	100.50	100.5	100.0	96.68	96.68			P
Barium	100.0	100.00	100	100.0	96.12	96.12			P
Beryllium	100.0	97.66	97.66	100.0	93.71	93.71			P
Boron	500.0	521.60	104.32	500.0	475.50	95.1			P
Cadmium	100.0	102.70	102.7	100.0	95.57	95.57			P
Calcium	10000.0	10230.00	102.3	10000.0	9630.00	96.3			P
Chromium	100.0	100.90	100.9	100.0	99.61	99.61			P
Cobalt	100.0	104.10	104.1	100.0	98.48	98.48			P
Copper	100.0	103.40	103.4	100.0	95.39	95.39			P
Iron	10000.0	10080.00	100.8	10000.0	9710.00	97.1			P
Lead	100.0	104.70	104.7	100.0	95.23	95.23			P
Magnesium	10000.0	10300.00	103	10000.0	9801.00	98.01			P
Manganese	100.0	101.60	101.6	100.0	99.85	99.85			P
Molybdenum	100.0	104.80	104.8	100.0	94.56	94.56			P
Nickel	100.0	102.40	102.4	100.0	97.02	97.02			P
Potassium	10000.0	10000.00	100	10000.0	9693.00	96.93			P
Selenium	100.0	99.62	99.62	100.0	92.75	92.75			P
Silver	100.0	105.00	105	100.0	96.03	96.03			P
Sodium	10000.0	10120.00	101.2	10000.0	9832.00	98.32			P
Strontium	100.0	104.70	104.7	100.0	95.76	95.76			P
Thallium	100.0	100.80	100.8	100.0	93.49	93.49			P
Tin	100.0	109.10	109.1	100.0	94.70	94.7			P
Titanium	100.0	104.40	104.4	100.0	96.23	96.23			P
Vanadium	100.0	103.00	103	100.0	99.22	99.22			P
Zinc	100.0	101.00	101	100.0	97.43	97.43			P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080227A

Continuing Calibration Source:

Start: 2/27/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Lithium	100.0	97.33	97.33	100.0	95.50	95.5	95.64	95.64	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080227A

Continuing Calibration Source:

Start: 2/27/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Lithium	100.0	97.33	97.33	100.0	94.25	94.25	96.51	96.51	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: ICP7500 080227A

Continuing Calibration Source:

Start: 2/27/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Lithium	100.0	97.33	97.33	100.0	96.80	96.8			P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	-3.2		-0.8		2.0	J	31.0		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L) C		Continuing Calibration Blank (ug/L)						Prepa- ration Blank C		M
	1	C	2	C	3	C					
Aluminum	-3.2		30.2		9.6	J	4.0	J	0.000		P

Note: MDLs are used, not IDLs

FORM III - IN



3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
	C		1	C	2	C	3	C	C		
Aluminum	-3.2		10.6		16.6		25.5		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	-3.2		18.8		7.2	J	33.2		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	-3.2		17.3						0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)	C	Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
			1	C	2	C	3	C		C	
Antimony	5.9		0.1		0.1		0.1		0.000		P
Arsenic	0.4		0.1		0.3		0.3		0.000		P
Barium	2.2	J	1.6	J	1.6	J	1.8	J	0.176		P
Beryllium	0.3		0.0		0.0		0.0		0.000		P
Boron	19.5	J	1.7		0.2		0.6		0.000		P
Cadmium	0.2	J	0.0		0.0		0.0		0.000		P
Calcium	-31.9		-21.0		-2.3		207.0	J	0.000		P
Chromium	0.3		0.0		0.0		0.1		0.000		P
Cobalt	0.1	J	0.0		0.0		0.0		0.000		P
Copper	0.6	J	0.4	J	0.2		0.6	J	0.230		P
Iron	27.2	J	40.7	J	17.6		57.2	J	0.000		P
Lead	0.2	J	0.1		0.0		0.4	J	0.000		P
Magnesium	24.9		0.9		1.9		10.7		0.000		P
Manganese	0.1		0.2		0.1		0.8		0.000		P
Molybdenum	1.0		0.1		0.1		0.1		0.000		P
Nickel	0.7	J	0.5	J	0.5	J	0.6	J	0.000		P
Potassium	0.5		-18.0		-21.0		-9.3		0.000		P
Selenium	1.7		2.3	J	2.1	J	2.0	J	0.253		P
Silver	1.2	J	1.0	J	1.0	J	1.0	J	0.102		P
Sodium	-127.2		-260.0		-270.0		-320.0		0.000		P
Strontium	0.2		0.3		0.4		0.6	J	0.000		P
Thallium	0.2		0.2		0.0		0.0		0.000		P
Tin	0.4		0.0		0.0		0.0		1.129		P
Titanium	0.2		0.0		0.1		0.3		0.000		P
Vanadium	1.0	J	0.8	J	1.1	J	1.2	J	0.149		P
Zinc	-2.8		-3.2		-3.7		-1.6		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	5.9		0.1		0.1		0.2		0.000		P
Arsenic	0.4		0.2		0.3		0.3		0.000		P
Barium	2.2	J	1.9	J	2.4	J	2.1	J	0.176		P
Beryllium	0.3		0.0		0.0		0.0		0.000		P
Boron	19.5	J	0.8		0.5		2.0		0.000		P
Cadmium	0.2	J	0.0		0.0		0.0		0.000		P
Calcium	-31.9		98.0	J	-71.0		-96.0		0.000		P
Chromium	0.3		0.1		0.1		0.1		0.000		P
Cobalt	0.1	J	0.0		0.0		0.0		0.000		P
Copper	0.6	J	0.5	J	0.0		0.1		0.230		P
Iron	27.2	J	62.1	J	39.9	J	33.1	J	0.000		P
Lead	0.2	J	0.1		0.0		0.0		0.000		P
Magnesium	24.9		12.9		6.2		5.5		0.000		P
Manganese	0.1		0.6		0.1		0.1		0.000		P
Molybdenum	1.0		0.0		0.0		0.1		0.000		P
Nickel	0.7	J	0.6	J	0.4	J	0.4	J	0.000		P
Potassium	0.5		1.7		-4.0		0.0		0.000		P
Selenium	1.7		2.4	J	2.1	J	2.6	J	0.253		P
Silver	1.2	J	1.0	J	1.0	J	1.1	J	0.102		P
Sodium	-127.2		-320.0		-330.0		-330.0		0.000		P
Strontium	0.2		0.4	J	0.2		0.1		0.000		P
Thallium	0.2		0.0		0.0		0.3		0.000		P
Tin	0.4		0.0		0.0		0.1		1.129		P
Titanium	0.2		2.0	J	0.3		0.1		0.000		P
Vanadium	1.0	J	1.1	J	1.2	J	1.0	J	0.149		P
Zinc	-2.8		-1.9		-3.9		-3.9		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	5.9		0.2		3.2	J	-0.8		0.000		P
Arsenic	0.4		0.3		0.5		0.0		0.000		P
Barium	2.2	J	1.7	J	2.2	J	1.4	J	0.176		P
Beryllium	0.3		0.0		0.8	J	0.0		0.000		P
Boron	19.5	J	0.4		22.9		-3.7		0.000		P
Cadmium	0.2	J	0.0		0.8	J	0.0		0.000		P
Calcium	-31.9		424.0	J	248.0	J	6.0		0.000		P
Chromium	0.3		0.0		-1.3		-1.9		0.000		P
Cobalt	0.1	J	0.0		0.6	J	0.0		0.000		P
Copper	0.6	J	0.2		1.5	J	0.7	J	0.230		P
Iron	27.2	J	57.6	J	104.0	J	11.5		0.000		P
Lead	0.2	J	0.0		1.0	J	0.1		0.000		P
Magnesium	24.9		11.6		96.4	J	6.7		0.000		P
Manganese	0.1		0.3		1.0		0.3		0.000		P
Molybdenum	1.0		0.0		2.0	J	-0.2		0.000		P
Nickel	0.7	J	0.5	J	0.9	J	0.2		0.000		P
Potassium	0.5		17.2		82.4	J	-7.0		0.000		P
Selenium	1.7		2.8	J	1.6		0.7		0.253		P
Silver	1.2	J	1.0	J	1.2	J	0.4	J	0.102		P
Sodium	-127.2		-320.0		90.2	J	-4.0		0.000		P
Strontium	0.2		1.0	J	1.1	J	0.0		0.000		P
Thallium	0.2		0.0		1.3	J	0.1		0.000		P
Tin	0.4		0.0		1.1	J	-0.1		1.129		P
Titanium	0.2		0.3		1.0	J	0.3		0.000		P
Vanadium	1.0	J	1.2	J	1.1	J	0.5	J	0.149		P
Zinc	-2.8		-4.0		0.8		0.1		0.000		P

Note: MDIs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	5.9		-0.7		-0.8		-0.8		0.000		P
Arsenic	0.4		0.0		0.0		0.0		0.000		P
Barium	2.2	J	1.4	J	1.3	J	1.6	J	0.176		P
Beryllium	0.3		0.0		0.0		0.0		0.000		P
Boron	19.5	J	-3.8		-2.9		-3.0		0.000		P
Cadmium	0.2	J	0.0		0.0		0.0		0.000		P
Calcium	-31.9		22.3		-42.0		-5.9		0.000		P
Chromium	0.3		-1.9		-1.9		-1.9		0.000		P
Cobalt	0.1	J	0.0		0.0		0.0		0.000		P
Copper	0.6	J	0.6	J	0.6	J	0.6	J	0.230		P
Iron	27.2	J	5.0		-7.7		27.9	J	0.000		P
Lead	0.2	J	0.0		0.1		0.1		0.000		P
Magnesium	24.9		7.4		0.3		11.3		0.000		P
Manganese	0.1		0.0		0.0		0.6		0.000		P
Molybdenum	1.0		-0.2		-0.1		-0.1		0.000		P
Nickel	0.7	J	0.1		0.2		0.2		0.000		P
Potassium	0.5		-2.0		-9.4		-3.6		0.000		P
Selenium	1.7		1.0		1.1		1.4		0.253		P
Silver	1.2	J	0.4	J	0.4	J	0.4	J	0.102		P
Sodium	-127.2		-6.9		-12.0		-3.0		0.000		P
Strontium	0.2		0.1		0.0		0.1		0.000		P
Thallium	0.2		0.0		0.0		0.0		0.000		P
Tin	0.4		0.1		-0.1		-0.1		1.129		P
Titanium	0.2		0.3		0.0		0.2		0.000		P
Vanadium	1.0	J	0.6	J	0.5	J	0.6	J	0.149		P
Zinc	-2.8		-1.0		-0.1		-0.1		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	5.9		-0.8						0.000		P
Arsenic	0.4		-0.1						0.000		P
Barium	2.2	J	1.4	J					0.176		P
Beryllium	0.3		0.0						0.000		P
Boron	19.5	J	-3.8						0.000		P
Cadmium	0.2	J	0.0						0.000		P
Calcium	-31.9		-30.0						0.000		P
Chromium	0.3		-1.9						0.000		P
Cobalt	0.1	J	0.0						0.000		P
Copper	0.6	J	0.6	J					0.230		P
Iron	27.2	J	6.3						0.000		P
Lead	0.2	J	0.0						0.000		P
Magnesium	24.9		3.3						0.000		P
Manganese	0.1		0.2						0.000		P
Molybdenum	1.0		-0.2						0.000		P
Nickel	0.7	J	0.1						0.000		P
Potassium	0.5		-8.0						0.000		P
Selenium	1.7		1.2						0.253		P
Silver	1.2	J	0.4	J					0.102		P
Sodium	-127.2		-10.0						0.000		P
Strontium	0.2		0.0						0.000		P
Thallium	0.2		-0.1						0.000		P
Tin	0.4		-0.1						1.129		P
Titanium	0.2		0.1						0.000		P
Vanadium	1.0	J	0.6	J					0.149		P
Zinc	-2.8		0.1						0.000		P

Note: MDLs are used, not IDLs

FORM III - IN



3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	-0.1		-0.4		-0.4		-0.1		0.000		P
Arsenic	0.0		0.0		0.0		0.0		0.000		P
Barium	1.4	J	1.3	J	1.3	J	1.2	J	0.000		P
Beryllium	0.2		0.0		0.0		0.0		0.000		P
Boron	-4.0		-6.2		-8.5		-8.8		0.000		P
Cadmium	0.2	J	0.0		0.0		0.0		0.000		P
Calcium	119.1	J	4.0		-11.0		6.4		0.000		P
Chromium	-1.8		-1.9		-1.8		-1.8		0.000		P
Cobalt	0.2	J	0.0		0.0		0.0		0.000		P
Copper	1.3	J	0.7	J	0.8	J	0.8	J	0.000		P
Iron	9.1		2.4		6.0		6.4		0.000		P
Lead	0.1		0.0		0.0		0.0		0.000		P
Magnesium	21.4		1.2		0.3		2.6		0.000		P
Manganese	0.1		0.0		0.0		0.0		0.000		P
Molybdenum	0.0		-0.2		-0.3		-0.1		0.000		P
Nickel	0.6	J	0.4	J	0.4	J	0.4	J	0.000		P
Potassium	16.2		-2.5		-5.7		-2.2		0.000		P
Selenium	2.1	J	2.2	J	2.1	J	2.6	J	0.000		P
Silver	0.9	J	0.8	J	0.8	J	0.8	J	0.000		P
Sodium	13.9		-13.0		-26.0		-39.0		0.000		P
Strontium	0.4		0.1		0.1		0.1		0.000		P
Thallium	0.0		-0.1		-0.2		-0.2		0.000		P
Tin	0.1		-0.1		-0.1		-0.1		0.000		P
Titanium	-0.8		-0.9		-0.9		-0.9		0.000		P
Vanadium	0.6	J	0.6	J	0.5	J	0.7	J	0.000		P
Zinc	2.6	J	0.9		1.1		1.1		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	-0.1		-0.4		-0.2		-0.2		0.000		P
Arsenic	0.0		0.1		0.3		0.5		0.000		P
Barium	1.4	J	1.4	J	1.8	J	1.8	J	0.000		P
Beryllium	0.2		0.0		0.2		0.2		0.000		P
Boron	-4.0		-9.0		-8.0		-8.6		0.000		P
Cadmium	0.2	J	0.0		0.2	J	0.1		0.000		P
Calcium	119.1	J	-26.0		82.1	J	75.0		0.000		P
Chromium	-1.8		-1.9		-1.7		-1.7		0.000		P
Cobalt	0.2	J	0.0		0.1	J	0.1	J	0.000		P
Copper	1.3	J	0.6	J	1.2	J	1.1	J	0.000		P
Iron	9.1		-4.9		41.7	J	26.4	J	0.000		P
Lead	0.1		0.0		0.2	J	0.2		0.000		P
Magnesium	21.4		-0.4		27.8	J	23.8		0.000		P
Manganese	0.1		0.6		0.3		0.2		0.000		P
Molybdenum	0.0		-0.3		-0.1		0.0		0.000		P
Nickel	0.6	J	0.4	J	0.6	J	0.6	J	0.000		P
Potassium	16.2		-11.0		10.4		2.1		0.000		P
Selenium	2.1	J	2.4	J	2.2	J	2.2	J	0.000		P
Silver	0.9	J	0.8	J	0.9	J	0.9	J	0.000		P
Sodium	13.9		-57.0		-42.0		-52.0		0.000		P
Strontium	0.4		0.0		0.4	J	0.4		0.000		P
Thallium	0.0		-0.2		0.0		0.2		0.000		P
Tin	0.1		-0.1		0.1		0.1		0.000		P
Titanium	-0.8		-1.0		-0.5		-0.1		0.000		P
Vanadium	0.6	J	0.6	J	1.2	J	1.2	J	0.000		P
Zinc	2.6	J	1.7	J	2.4	J	2.5	J	0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	-0.1		-0.3		-0.1		0.9		0.000		P
Arsenic	0.0		0.0		0.2		0.3		0.000		P
Barium	1.4	J	1.7	J	2.2	J	2.3	J	0.000		P
Beryllium	0.2		0.0		0.2		0.8	J	0.000		P
Boron	-4.0		-8.5		-7.4		20.1		0.000		P
Cadmium	0.2	J	0.0		0.1		0.8	J	0.000		P
Calcium	119.1	J	-22.0		584.0		242.0	J	0.000		P
Chromium	-1.8		-1.8		-1.7		-1.4		0.000		P
Cobalt	0.2	J	0.0		0.2	J	0.4	J	0.000		P
Copper	1.3	J	0.7	J	1.1	J	1.3	J	0.000		P
Iron	9.1		51.4	J	51.1	J	81.3	J	0.000		P
Lead	0.1		0.1		0.2	J	1.0	J	0.000		P
Magnesium	21.4		7.1		32.1	J	94.3	J	0.000		P
Manganese	0.1		0.4		0.5		0.8		0.000		P
Molybdenum	0.0		-0.1		-0.1		2.1	J	0.000		P
Nickel	0.6	J	0.5	J	0.6	J	1.2	J	0.000		P
Potassium	16.2		-4.6		17.3		67.3	J	0.000		P
Selenium	2.1	J	3.2	J	2.9	J	1.4		0.000		P
Silver	0.9	J	0.8	J	0.9	J	1.4	J	0.000		P
Sodium	13.9		-70.0		-52.0		76.1	J	0.000		P
Strontium	0.4		0.1		1.2	J	1.0	J	0.000		P
Thallium	0.0		0.2		0.1		1.5	J	0.000		P
Tin	0.1		-0.1		0.1		1.1	J	0.000		P
Titanium	-0.8		-0.8		0.0		1.0	J	0.000		P
Vanadium	0.6	J	0.8	J	0.9	J	1.0	J	0.000		P
Zinc	2.6	J	1.7	J	2.4	J	1.5	J	0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	-0.1		-0.3		-0.3		1.1	J	0.000		P
Arsenic	0.0		-0.1		-0.1		0.4		0.000		P
Barium	1.4	J	3.0	J	1.2	J	2.6	J	0.000		P
Beryllium	0.2		0.0		0.0		0.8	J	0.000		P
Boron	-4.0		-2.8		-1.9		24.0		0.000		P
Cadmium	0.2	J	0.0		0.0		0.8	J	0.000		P
Calcium	119.1	J	385.0	J	56.9		281.0	J	0.000		P
Chromium	-1.8		-1.8		-1.9		-1.2		0.000		P
Cobalt	0.2	J	0.0		0.0		0.5	J	0.000		P
Copper	1.3	J	0.6	J	0.6	J	1.8	J	0.000		P
Iron	9.1		60.8	J	10.6		108.0	J	0.000		P
Lead	0.1		0.2		0.1		1.0	J	0.000		P
Magnesium	21.4		38.4	J	2.0		101.0	J	0.000		P
Manganese	0.1		8.5		0.5		1.4	J	0.000		P
Molybdenum	0.0		-0.1		0.0		2.1	J	0.000		P
Nickel	0.6	J	0.4	J	0.3	J	1.4	J	0.000		P
Potassium	16.2		7.3		10.7		89.5	J	0.000		P
Selenium	2.1	J	2.1	J	2.5	J	2.7	J	0.000		P
Silver	0.9	J	0.7	J	0.7	J	1.6	J	0.000		P
Sodium	13.9		-12.0		-4.6		94.4	J	0.000		P
Strontium	0.4		0.4	J	0.1		1.1	J	0.000		P
Thallium	0.0		-0.1		0.0		1.7	J	0.000		P
Tin	0.1		-0.1		-0.1		1.1	J	0.000		P
Titanium	-0.8		0.3		0.0		1.1	J	0.000		P
Vanadium	0.6	J	0.8	J	0.7	J	1.2	J	0.000		P
Zinc	2.6	J	1.6	J	1.5	J	1.7	J	0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	-0.1		-0.1						0.000		P
Arsenic	0.0		0.1						0.000		P
Barium	1.4	J	1.5	J					0.000		P
Beryllium	0.2		0.0						0.000		P
Boron	-4.0		-2.6						0.000		P
Cadmium	0.2	J	-0.1						0.000		P
Calcium	119.1	J	20.2						0.000		P
Chromium	-1.8		-1.7						0.000		P
Cobalt	0.2	J	-0.1						0.000		P
Copper	1.3	J	1.0	J					0.000		P
Iron	9.1		-5.7						0.000		P
Lead	0.1		0.0						0.000		P
Magnesium	21.4		-1.8						0.000		P
Manganese	0.1		0.2						0.000		P
Molybdenum	0.0		-0.2						0.000		P
Nickel	0.6	J	0.6	J					0.000		P
Potassium	16.2		-4.9						0.000		P
Selenium	2.1	J	1.6						0.000		P
Silver	0.9	J	0.8	J					0.000		P
Sodium	13.9		-1.4						0.000		P
Strontium	0.4		0.0						0.000		P
Thallium	0.0		-0.2						0.000		P
Tin	0.1		-0.1						0.000		P
Titanium	-0.8		-0.1						0.000		P
Vanadium	0.6	J	1.3	J					0.000		P
Zinc	2.6	J	1.9	J					0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	4.6	J	4.2	J	3.7	J	4.0	J	0.633		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
	C		1	C	2	C	3	C	C		
Aluminum	4.6	J	3.9	J	27.8		26.9		0.633		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500\_080221A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	4.6	J	45.1		32.5		20.7		0.633		P

Note: MDLs are used, not IDLs

FORM III - IN



3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	4.6	J	46.7		5.3	J	28.2		0.633		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
	C		1	C	2	C	3	C	C		
Aluminum	4.6	J	8.0	J					0.633		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080222A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	-0.6		4.6	J	-1.0		-2.8		0.000		P
Antimony	4.2	J	0.1		0.3		0.2		0.000		P
Arsenic	0.3		0.2		0.2		0.0		0.000		P
Barium	0.2		0.0		0.1		-0.1		0.000		P
Beryllium	0.3		0.0		0.0		0.0		0.000		P
Boron	18.9	J	-0.3		6.4		1.0		0.000		P
Cadmium	0.3	J	0.0		0.0		0.0		0.000		P
Calcium	-274.2		-520.0		-590.0		-590.0		0.000		P
Chromium	-0.1		-0.2		-0.2		-0.2		0.000		P
Cobalt	0.2	J	0.0		0.0		0.0		0.000		P
Copper	-0.2		-0.7		-0.6		-0.6		0.000		P
Iron	34.5	J	8.1		11.4		-5.7		0.000		P
Lead	0.2	J	0.0		0.0		-0.1		0.000		P
Magnesium	28.0	J	3.3		14.8		10.8		0.000		P
Manganese	0.0		-0.1		0.0		0.0		0.000		P
Molybdenum	1.4		0.0		0.1		16.9		0.000		P
Nickel	-0.1		-0.3		-0.3		-0.3		0.000		P
Potassium	23.7	J	-13.0		4.6		-4.1		0.000		P
Selenium	0.6		0.8		1.7	J	1.4		0.000		P
Silver	-0.2		-0.5		-0.5		-0.5		0.000		P
Sodium	-6.1		-67.0		-33.0		-25.0		0.000		P
Strontium	0.3		0.0		0.3		0.3		0.000		P
Thallium	0.3		0.0		0.2		0.0		0.000		P
Tin	0.4		0.0		0.1		0.0		0.000		P
Titanium	0.3		0.1		0.1		0.0		0.000		P
Vanadium	-0.1		-0.1		0.2		-0.1		0.000		P
Zinc	-1.7		-2.6		-2.8		-2.0		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080222A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	-0.6		19.3		6.8	J	21.8		0.000		P
Antimony	4.2	J	7.0		-1.2		6.9		0.000		P
Arsenic	0.3		0.5		0.2		0.4		0.000		P
Barium	0.2		1.0	J	0.1		1.3	J	0.000		P
Beryllium	0.3		0.5	J	0.0		0.9	J	0.000		P
Boron	18.9	J	21.4		-5.0		26.9		0.000		P
Cadmium	0.3	J	0.6	J	0.0		0.9	J	0.000		P
Calcium	-274.2		157.0	J	-20.0		246.0	J	0.000		P
Chromium	-0.1		-0.2		-0.5		-0.1		0.000		P
Cobalt	0.2	J	0.3	J	0.0		0.4	J	0.000		P
Copper	-0.2		0.3		-0.3		0.7	J	0.000		P
Iron	34.5	J	78.9	J	6.1		130.0	J	0.000		P
Lead	0.2	J	0.7	J	0.0		1.0	J	0.000		P
Magnesium	28.0	J	67.0	J	2.9		106.0	J	0.000		P
Manganese	0.0		1.1	J	-0.1		1.1	J	0.000		P
Molybdenum	1.4		2.9	J	-2.1		7.3		0.000		P
Nickel	-0.1		0.2		-0.3		0.7	J	0.000		P
Potassium	23.7	J	49.9	J	-3.8		95.0	J	0.000		P
Selenium	0.6		0.5		-0.3		2.2	J	0.000		P
Silver	-0.2		0.3	J	-0.2		0.6	J	0.000		P
Sodium	-6.1		56.2	J	5.3		96.8	J	0.000		P
Strontium	0.3		0.8	J	0.1		1.2	J	0.000		P
Thallium	0.3		0.7	J	-0.1		1.2	J	0.000		P
Tin	0.4		0.7	J	-0.1		1.3	J	0.000		P
Titanium	0.3		0.8	J	0.1		1.0	J	0.000		P
Vanadium	-0.1		-0.2		0.0		0.0		0.000		P
Zinc	-1.7		0.2		0.8		0.8		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080222A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	-0.6		2.0	J					0.000		P
Antimony	4.2	J	-0.9						0.000		P
Arsenic	0.3		-0.1						0.000		P
Barium	0.2		0.0						0.000		P
Beryllium	0.3		0.0						0.000		P
Boron	18.9	J	-3.5						0.000		P
Cadmium	0.3	J	0.0						0.000		P
Calcium	-274.2		-0.4						0.000		P
Chromium	-0.1		-0.5						0.000		P
Cobalt	0.2	J	0.0						0.000		P
Copper	-0.2		-0.2						0.000		P
Iron	34.5	J	-14.0						0.000		P
Lead	0.2	J	0.0						0.000		P
Magnesium	28.0	J	2.1						0.000		P
Manganese	0.0		0.0						0.000		P
Molybdenum	1.4		0.2						0.000		P
Nickel	-0.1		-0.2						0.000		P
Potassium	23.7	J	-2.8						0.000		P
Selenium	0.6		0.9						0.000		P
Silver	-0.2		-0.3						0.000		P
Sodium	-6.1		-3.5						0.000		P
Strontium	0.3		0.1						0.000		P
Thallium	0.3		-0.1						0.000		P
Tin	0.4		0.0						0.000		P
Titanium	0.3		-0.2						0.000		P
Vanadium	-0.1		-0.2						0.000		P
Zinc	-1.7		1.7	J					0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc. Contract: \_\_\_\_\_

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.: \_\_\_\_\_ SDG No.: 0802318

Preparation Blank Matrix (soil/water): SOIL Run: ICP7500 080227A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Lithium	-0.4		-0.8		-0.8		-0.8		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080227A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Lithium	-0.4		-0.7		-0.8				0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

Last Callb: Feb 28, 2008 12:10 pm  
 Calibration Type: External Calibration Method  
 Calibration Title: ICP\_OR.S  
 Weighting Method: 1/(SD\*SD)  
 Mass Interpolation Fit for VIS: Point to Point  
 Method: C:\PCPCHEM\1\METHODS\ICP\_OR.S.M  
 Multi Tune: #1 012807a5.u  
 #2 012807he.u

== Standard Files ==

<Data Correction>

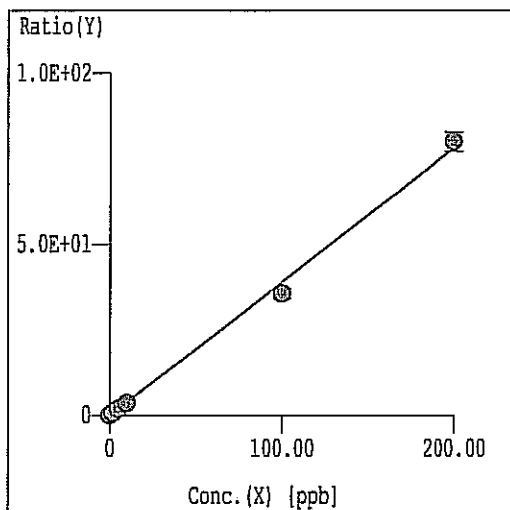
Bkg File: ---  
 Rejected Masses: ---  
 Interference Correction: ON

	Data File	Sample Name	Date Acquired
1	c:\pcpchem\1\data\08b20m00.b\003calb.d\003calb.d#	CAL BLK	Feb 20 2008 12:23 pm
2	c:\pcpchem\1\data\08b20m00.b\004cals.d\004cals.d#	2/10/200	Feb 20 2008 12:29 pm
3	c:\pcpchem\1\data\08b20m00.b\005cals.d\005cals.d#	5/25/500	Feb 20 2008 12:35 pm
4	c:\pcpchem\1\data\08b20m00.b\006cals.d\006cals.d#	10/50/1000	Feb 20 2008 12:41 pm
5	c:\pcpchem\1\data\08b20m00.b\007cals.d\007cals.d#	100/500/10K	Feb 20 2008 12:47 pm
6	c:\pcpchem\1\data\08b20m00.b\008cals.d\008cals.d#	200/1000/20K	Feb 20 2008 12:53 pm
7	---		
8	---		
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13	---		
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18	---		
19	---		
20	---		



## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 9 Be                    6       ppb

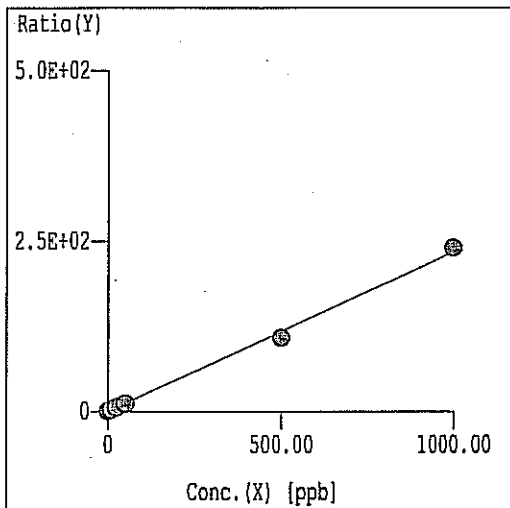


	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	3.333	1.759E-03	P	102.0
2		2.000	1.889	1448	7.407E-01	P	1.467
3		5.000	4.891	3699	1.916E+00	P	3.527
4		10.00	9.195	7071	3.600E+00	P	6.675
5		100.0	91.14	7.014E+04	3.566E+01	P	4.152
6		200.0	204.5	1.439E+05	8.001E+01	P	3.484
7		50.00					
8							
9							
10							
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12							
13							
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Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9986$   
 $Y = 3.913E-001 \cdot X + 1.759E-003$   
 $X = 2.556E+000 \cdot Y - 4.495E-003$   
DL = 1.375E-02 ppb  
BEC = 4.495E-03 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 11 B                    6       ppb



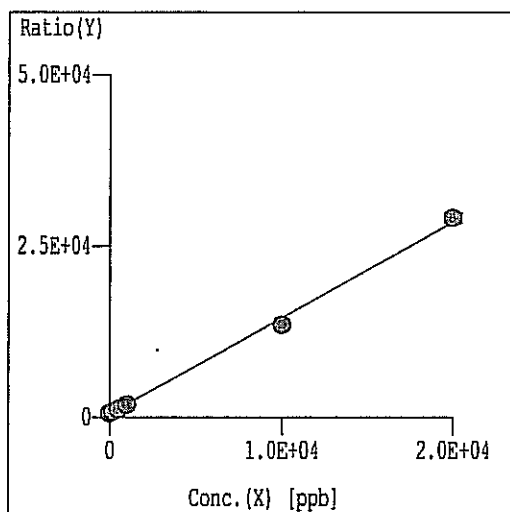
	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	754.5	3.870E-01	P	7.702
2		10.00	9.211	4981	2.550E+00	P	3.926
3		25.00	23.31	1.131E+04	5.861E+00	P	3.231
4		50.00	45.88	2.194E+04	1.116E+01	P	4.728
5		500.0	458.3	2.126E+05	1.080E+02	P	2.369
6		1000	1021	4.322E+05	2.402E+02	P	1.538
7		250.0					
8							
9							
10							
11							
12							
13							
14							
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17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9988$   
 $Y = 2.348E-001 \cdot X + 3.870E-001$   
 $X = 4.258E+000 \cdot Y - 1.648E+000$   
DL = 3.807E-01 ppb  
BEC = 1.648 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 23 Na                72      ppb

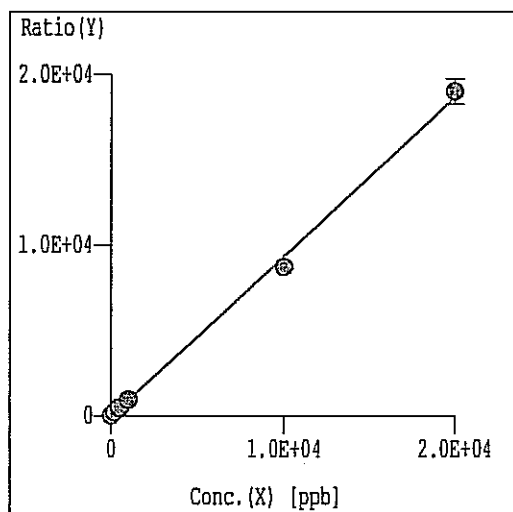


	Rict	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	9.979E+05	5.651E+02	A 4.091
2		200.0	189.1	1.476E+06	8.297E+02	A 3.485
3		500.0	436.2	2.167E+06	1.175E+03	A 3.691
4		1000	904.7	3.453E+06	1.831E+03	A 2.464
5		1.000E+04	9231	2.592E+07	1.348E+04	A 2.435
6		2.000E+04	2.039E+04	5.228E+07	2.909E+04	A 2.520
7		5000				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9990$   
 $Y = 1.399E+000 \cdot X + 5.651E+002$   
 $X = 7.147E-001 \cdot Y - 4.039E+002$   
DL = 49.57 ppb  
BEC = 403.9 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 24 Mg                72      ppb



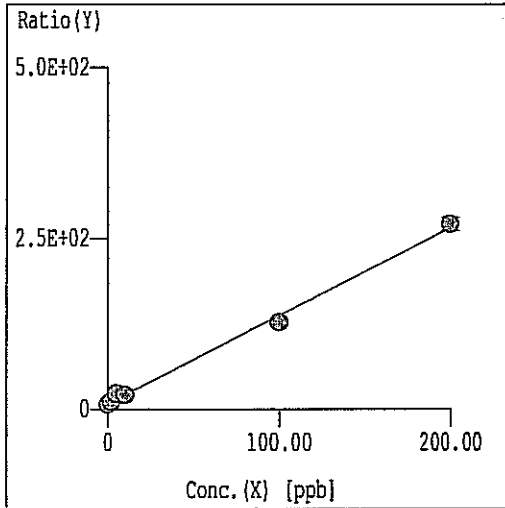
	Rict	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	3240	1.848E+00	P 34.34
2		200.0	226.8	3.800E+05	2.136E+02	P 4.438
3		500.0	504.7	8.719E+05	4.730E+02	A 3.874
4		1000	994.6	1.755E+06	9.304E+02	A 1.495
5		1.000E+04	9315	1.673E+07	8.698E+03	A 1.059
6		2.000E+04	2.034E+04	3.412E+07	1.899E+04	A 3.906
7		5000				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9992$   
 $Y = 9.336E-001 \cdot X + 1.848E+000$   
 $X = 1.071E+000 \cdot Y - 1.980E+000$   
DL = 2.040 ppb  
BEC = 1.980 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 27 Al                72     ppb

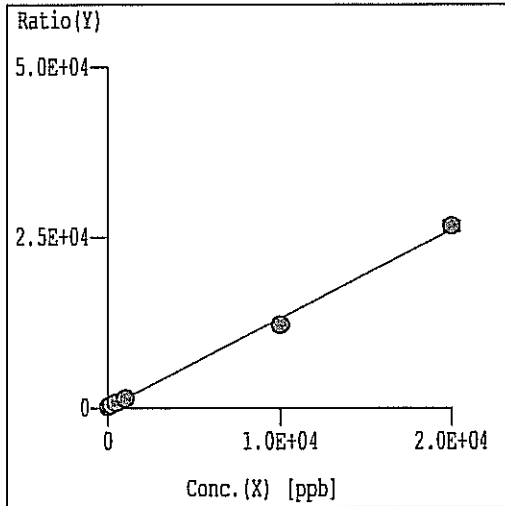


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.440E+00	1.183E+04	6.743E+00	P	30.60
2		2.000	2.001	1.982E+04	1.117E+01	P	18.14
3		5.000	11.12	4.202E+04	2.290E+01	P	24.95
4		10.00	9.484	3.915E+04	2.080E+01	P	11.40
5		100.0	91.93	2.440E+05	1.269E+02	P	2.423
6		200.0	203.9	4.867E+05	2.710E+02	P	3.629
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:  $Y=aX+b$   
 $r = 0.9982$   
 $Y = 1.287E+000 \cdot X + 8.596E+000$   
 $X = 7.772E-001 \cdot Y - 6.680E+000$   
DL = 4.811 ppb  
BEC = 6.680 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 39 K                72     ppb



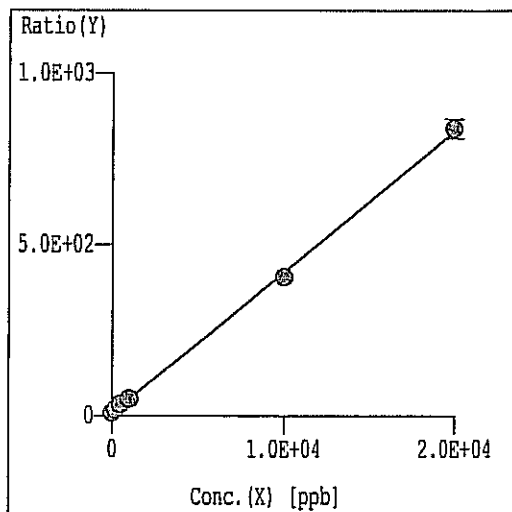
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	2.733E+05	1.548E+02	P	4.489
2		200.0	219.5	7.830E+05	4.400E+02	P	3.004
3		500.0	486.3	1.450E+06	7.867E+02	A	4.478
4		1000	956.5	2.636E+06	1.398E+03	A	2.406
5		1.000E+04	9227	2.336E+07	1.215E+04	A	1.690
6		2.000E+04	2.039E+04	4.788E+07	2.665E+04	A	2.973
7		5000					
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9							
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11							
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14							
15							
16							
17							
18							
19							
20							

Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9990$   
 $Y = 1.299E+000 \cdot X + 1.548E+002$   
 $X = 7.695E-001 \cdot Y - 1.191E+002$   
DL = 16.04 ppb  
BEC = 119.1 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 44 Ca                72     ppb

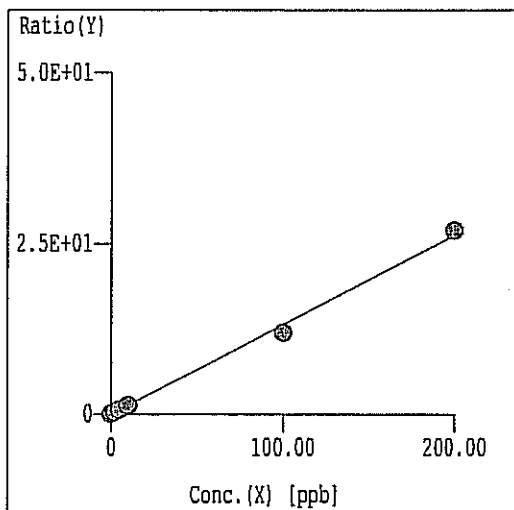


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	1.562E+04	8.859E+00	P	11.55
2		200.0	226.7	3.232E+04	1.817E+01	P	7.313
3		500.0	602.9	6.190E+04	3.363E+01	P	10.87
4		1000	989.7	9.336E+04	4.952E+01	P	4.376
5		1.000E+04	9628	7.777E+05	4.045E+02	P	2.247
6		2.000E+04	2.018E+04	1.506E+06	8.382E+02	A	3.382
7		5000					
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9							
10							
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14							
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18							
19							
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Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9997$   
 $Y = 4.109E-002 * X + 8.859E+000$   
 $X = 2.434E+001 * Y - 2.156E+002$   
DL = 74.70 ppb  
BEC = 215.6 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 47 Ti                72     ppb



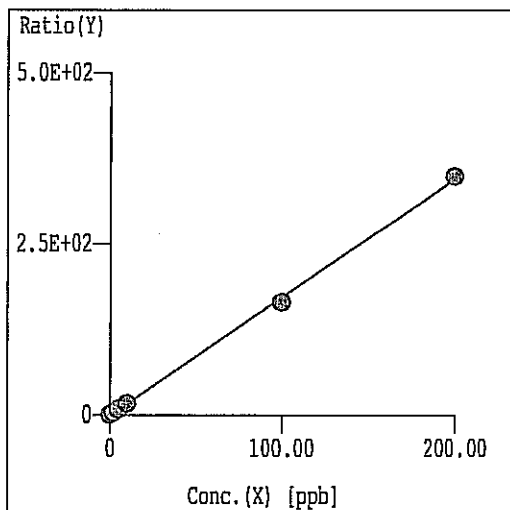
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	32.23	1.847E-02	P	80.22
2		2.000	2.075	518.9	2.913E-01	P	9.194
3		5.000	4.743	1185	6.421E-01	P	4.643
4		10.00	9.499	2389	1.267E+00	P	5.043
5		100.0	90.62	2.295E+04	1.193E+01	P	1.432
6		200.0	204.7	4.840E+04	2.694E+01	P	1.859
7		50.00					
8							
9							
10							
11							
12							
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14							
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17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9985$   
 $Y = 1.315E-001 * X + 1.847E-002$   
 $X = 7.605E+000 * Y - 1.405E-001$   
DL = 2.538E-01 ppb  
BEC = 1.405E-01 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 51 V                72    ppb

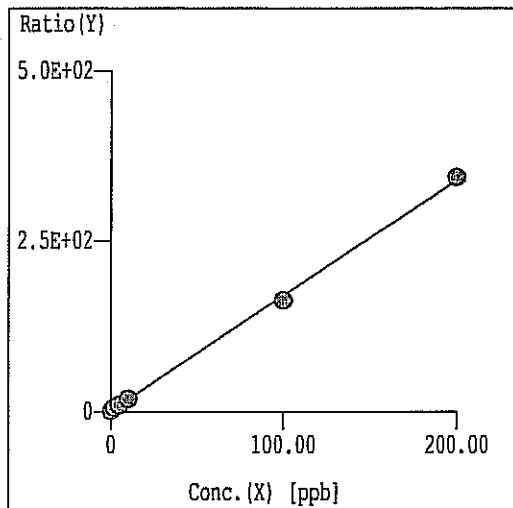


	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	7.749E-01	258.9	4.183E-01	P	21.09
2		2.000	2.600	2277	3.576E+00	P	3.313
3		5.000	5.582	5611	8.736E+00	P	1.265
4		10.00	10.23	1.113E+04	1.678E+01	P	2.280
5		100.0	95.69	1.105E+05	1.646E+02	P	4.247E-01
6		200.0	202.1	2.237E+05	3.488E+02	P	6.184E-01
7		50.00					
8							
9							
10							
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18							
19							
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Curve Fit:  $Y=aX+b$   
 $r = 0.9996$   
 $Y = 1.730E+000 \cdot X - 9.222E-001$   
 $X = 5.780E-001 \cdot Y + 5.331E-001$   
 $DL = 1.530E-01$  ppb  
 $BEC = -5.331E-01$  ppb

Weight: OFF  
 Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 52 Cr                72    ppb



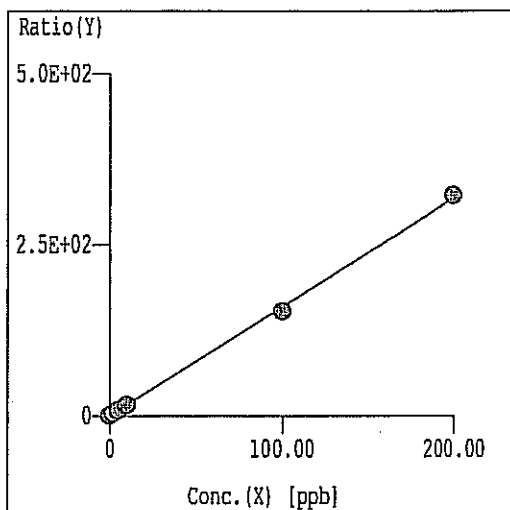
	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	595.6	9.606E-01	P	10.98
2		2.000	2.831	3663	5.756E+00	P	2.327
3		5.000	5.017	6076	9.460E+00	P	2.258
4		10.00	10.41	1.234E+04	1.860E+01	P	1.683
5		100.0	95.36	1.091E+05	1.625E+02	P	5.113E-01
6		200.0	202.3	2.204E+05	3.437E+02	P	1.661
7		50.00					
8							
9							
10							
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12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9996$   
 $Y = 1.694E+000 \cdot X + 9.606E-001$   
 $X = 5.903E-001 \cdot Y - 5.670E-001$   
 $DL = 1.868E-01$  ppb  
 $BEC = 5.670E-01$  ppb

Weight: OFF  
 Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 55 Mn                72      ppb

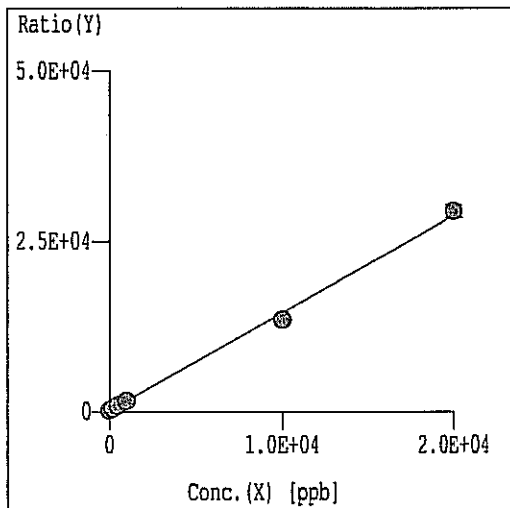


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	223.3	3.598E-01	P	8.489
2		2.000	2.129	2386	3.753E+00	P	9.986
3		5.000	4.911	5260	8.189E+00	P	1.288
4		10.00	9.832	1.064E+04	1.603E+01	P	1.579
5		100.0	95.80	1.027E+05	1.531E+02	P	6.114E-01
6		200.0	202.1	2.069E+05	3.225E+02	P	1.095
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9997$   
 $Y = 1.594E+000 \cdot X + 3.598E-001$   
 $X = 6.274E-001 \cdot Y - 2.257E-001$   
DL = 5.749E-02 ppb  
BEC = 2.257E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 56 Fe                72      ppb



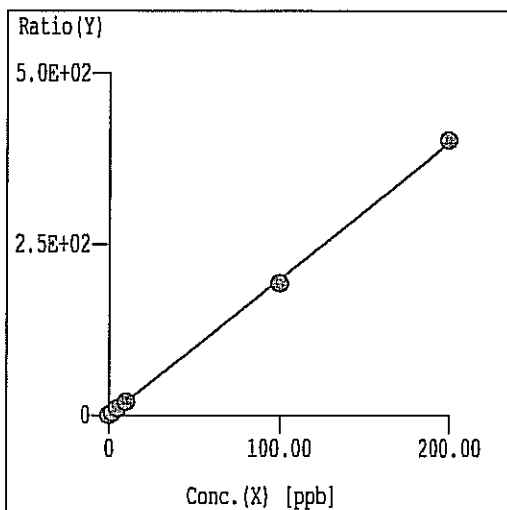
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	3.285E+05	1.861E+02	P	7.005
2		200.0	203.5	8.512E+05	4.783E+02	A	2.912
3		500.0	504.2	1.678E+06	9.100E+02	A	2.787
4		1000	972.1	2.982E+06	1.582E+03	A	3.360
5		1.000E+04	9266	2.595E+07	1.349E+04	A	1.139E-01
6		2.000E+04	2.037E+04	5.287E+07	2.943E+04	A	3.055
7		5000					
8							
9							
10							
11							
12							
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17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9991$   
 $Y = 1.436E+000 \cdot X + 1.861E+002$   
 $X = 6.965E-001 \cdot Y - 1.296E+002$   
DL = 27.25 ppb  
BEC = 129.6 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 59 Co                72    ppb

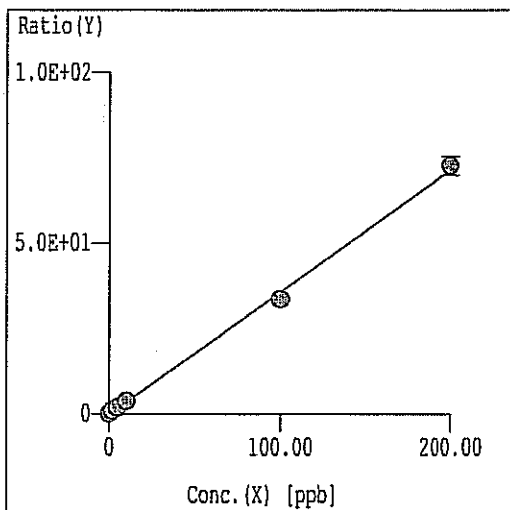


	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	13.33	2.149E-02	P	24.86
2		2.000	1.979	2526	3.966E+00	P	3.662
3		5.000	5.075	6513	1.014E+01	P	2.300
4		10.00	9.802	1.298E+04	1.956E+01	P	3.301
5		100.0	96.92	1.297E+05	1.932E+02	P	9.118E-01
6		200.0	201.5	2.577E+05	4.017E+02	P	4.764E-01
7		50.00					
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9							
10							
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18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9998$   
 $Y = 1.993E+000 \cdot X + 2.149E-002$   
 $X = 5.018E-001 \cdot Y - 1.078E-002$   
 $DL = 8.041E-03 \text{ ppb}$   
 $BEC = 1.078E-02 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 60 Ni                72    ppb



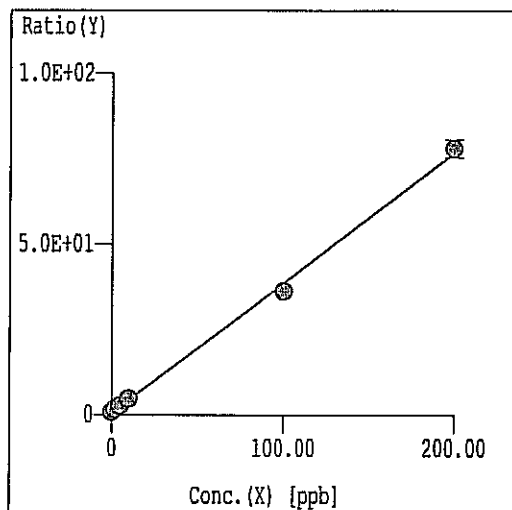
	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	5.550E-01	161.1	9.153E-02	P	17.67
2		2.000	3.159	1826	1.025E+00	P	1.857
3		5.000	5.613	3512	1.906E+00	P	7.160
4		10.00	10.82	7115	3.772E+00	P	1.026
5		100.0	93.85	3.453E+04	3.356E+01	P	1.578
6		200.0	203.0	1.306E+05	7.271E+01	P	3.780
7		50.00					
8							
9							
10							
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18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9993$   
 $Y = 3.587E-001 \cdot X - 1.076E-001$   
 $X = 2.788E+000 \cdot Y + 2.998E-001$   
 $DL = 1.353E-01 \text{ ppb}$   
 $BEC = -2.998E-01 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 65 Cu                72     ppb

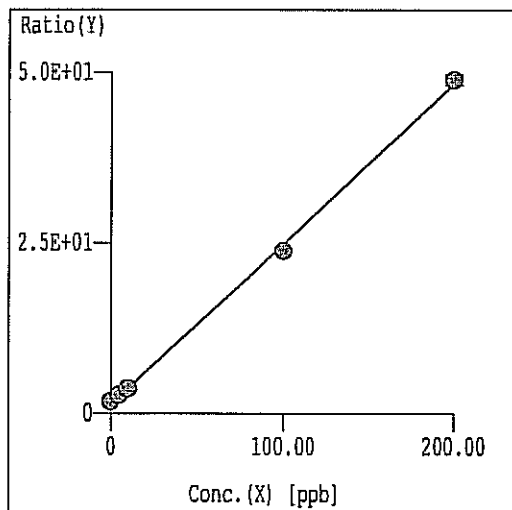


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	6.201E-01	1331	7.533E-01	P	6.591
2		2.000	2.995	2953	1.660E+00	P	5.764
3		5.000	5.671	4945	2.681E+00	P	1.425
4		10.00	11.00	8888	4.715E+00	P	3.823
5		100.0	93.59	6.968E+04	3.624E+01	P	2.242
6		200.0	203.1	1.402E+05	7.806E+01	P	3.294
7		50.00					
8							
9							
10							
11							
12							
13							
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Curve Fit:  $Y=aX+b$   
 $r = 0.9992$   
 $Y = 3.817E-001 \cdot X + 5.166E-001$   
 $X = 2.620E+000 \cdot Y - 1.353E+000$   
DL = 3.902E-01 ppb  
BEC = 1.353 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 66 Zn                72     ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.719	1065	1.716E+00	P	4.986
2	ON	2.000		1395	2.192E+00	P	1.769
3		5.000	5.741	1710	2.663E+00	P	2.979
4		10.00	9.749	2392	3.607E+00	P	4.582
5		100.0	95.59	1.599E+04	2.382E+01	P	6.681E-01
6		200.0	202.2	3.137E+04	4.891E+01	P	1.569
7							
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10							
11							
12							
13							
14							
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17							
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19							
20							

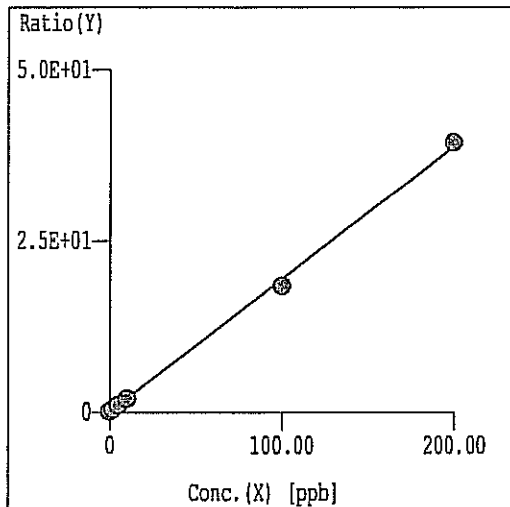
Curve Fit:  $Y=aX+b$   
 $r = 0.9995$   
 $Y = 2.354E-001 \cdot X + 1.311E+000$   
 $X = 4.248E+000 \cdot Y - 5.570E+000$   
DL = 1.090 ppb  
BEC = 5.570 ppb

Weight: OFF  
Min Conc: 0.000



=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 75 As                72    ppb

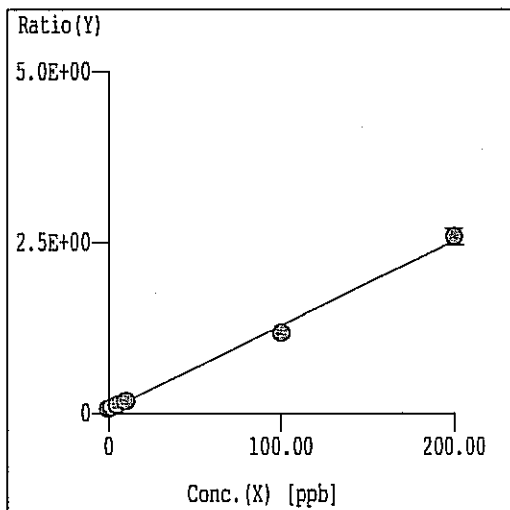


	Rjct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	75.19	1.212E-01	P	9.323
2		2.000	1.909	312.6	4.909E-01	P	5.916
3		5.000	4.910	689.3	1.072E+00	P	5.118
4		10.00	9.614	1315	1.983E+00	P	4.979
5		100.0	94.56	1.237E+04	1.843E+01	P	8.060E-01
6		200.0	202.7	2.526E+04	3.938E+01	P	7.557E-01
7		50.00					
8							
9							
10							
11							
12							
13							
14							
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18							
19							
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Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9995$   
 $Y = 1.936E-001 \cdot X + 1.212E-001$   
 $X = 5.164E+000 \cdot Y - 6.261E-001$   
DL = 1.751E-01 ppb  
BEC = 6.261E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 82 Se                72    ppb



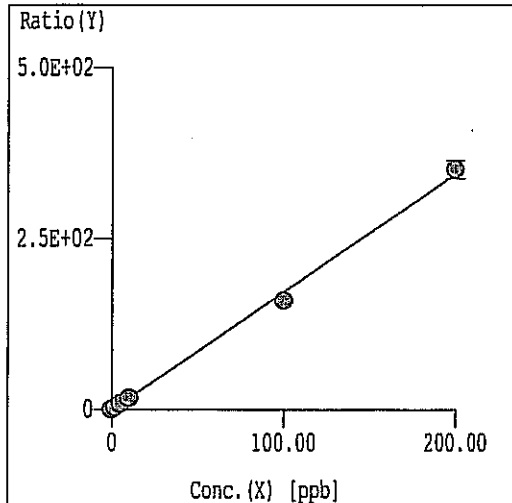
	Rjct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.539	117.4	6.648E-02	P	8.964
2		2.000	3.378	158.9	8.936E-02	P	10.34
3		5.000	6.141	227.8	1.237E-01	P	9.522
4		10.00	10.58	337.4	1.789E-01	P	2.951
5		100.0	90.87	2265	1.178E+00	P	2.671
6		200.0	204.5	4653	2.591E+00	P	4.567
7		50.00					
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9							
10							
11							
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Curve Fit:  $Y=aX+b$   
 $r = 0.9984$   
 $Y = 1.244E-002 \cdot X + 4.734E-002$   
 $X = 8.040E+001 \cdot Y - 3.806E+000$   
DL = 1.437 ppb  
BEC = 3.806 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 88 Sr                72      ppb

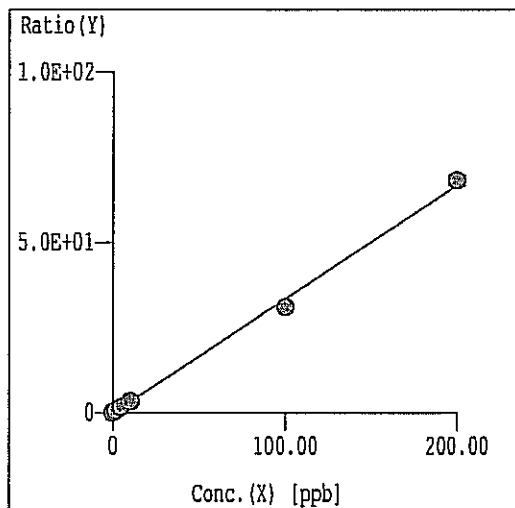


	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	180.0	1.032E-01	P 56.13
2		2.000	2.019	6379	3.585E+00	P 4.342
3		5.000	5.001	1.609E+04	8.729E+00	P 5.031
4		10.00	9.696	3.172E+04	1.683E+01	P 5.004
5		100.0	92.60	3.073E+05	1.598E+02	P 1.842
6		200.0	203.7	6.313E+05	3.515E+02	P 3.834
7		50.00				
8						
9						
10						
11						
12						
13						
14						
15						
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17						
18						
19						
20						

Curve Fit:       $Y=aX+[\text{blank}]$   
 $r = 0.9990$   
 $Y = 1.725E+000 \cdot X + 1.032E-001$   
 $X = 5.798E-001 \cdot Y - 5.983E-002$   
DL = 1.007E-01 ppb  
BEC = 5.983E-02 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 95 Mo                72      ppb



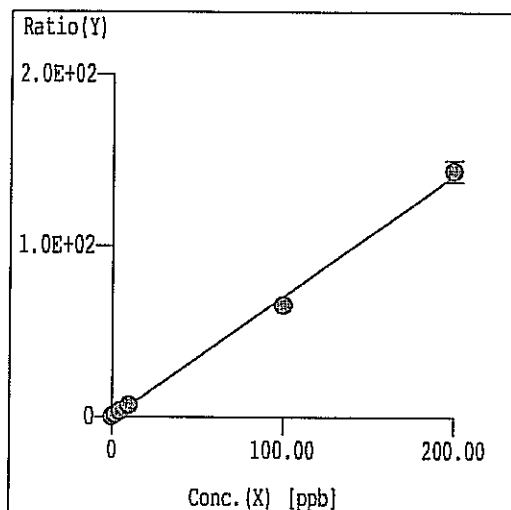
	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	26.67	1.522E-02	P 35.61
2		2.000	1.967	1199	6.736E-01	P 2.750
3		5.000	4.893	3048	1.653E+00	P 2.258
4		10.00	9.764	6191	3.283E+00	P 2.735
5		100.0	92.34	5.948E+04	3.092E+01	P 7.038E-01
6		200.0	203.8	1.226E+05	6.824E+01	P 2.328
7		50.00				
8						
9						
10						
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12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:       $Y=aX+[\text{blank}]$   
 $r = 0.9990$   
 $Y = 3.347E-001 \cdot X + 1.522E-002$   
 $X = 2.988E+000 \cdot Y - 4.547E-002$   
DL = 4.858E-02 ppb  
BEC = 4.547E-02 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 109 Ag                72     ppb

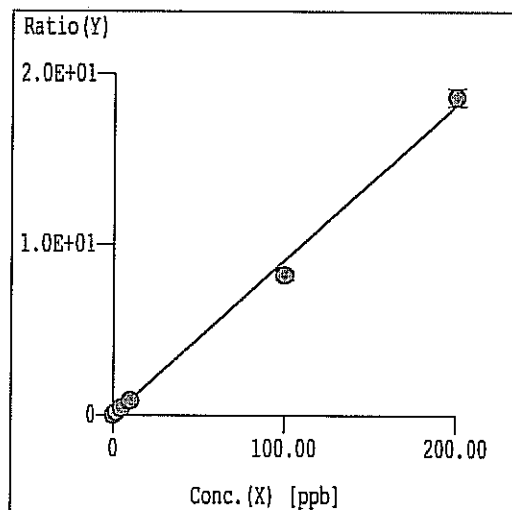


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.091	130.0	7.412E-02	P	32.21
2		2.000	3.071	2637	1.482E+00	P	3.752
3		5.000	5.858	6386	3.463E+00	P	2.846
4		10.00	10.60	1.289E+04	6.835E+00	P	9.164E-01
5		100.0	92.88	1.256E+05	6.533E+01	P	1.784
6		200.0	203.5	2.586E+05	1.440E+02	P	4.363
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9990$   
 $Y = 7.109E-001 * X - 7.014E-001$   
 $X = 1.407E+000 * Y + 9.867E-001$   
DL = 1.007E-01 ppb  
BEC = -9.867E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 111 Cd                115     ppb



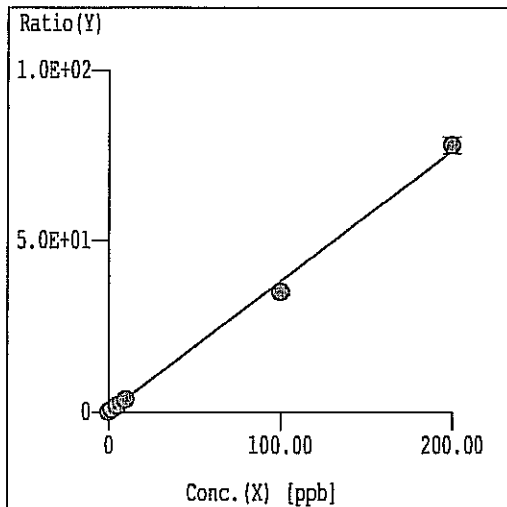
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	2.222	7.695E-04	P	52.53
2		2.000	1.934	524.1	1.767E-01	P	11.79
3		5.000	4.719	1318	4.300E-01	P	3.396
4		10.00	9.350	2693	8.513E-01	P	2.732
5		100.0	90.04	2.603E+04	8.191E+00	P	3.316
6		200.0	205.0	5.429E+04	1.865E+01	P	2.800
7		50.00					
8							
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19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9983$   
 $Y = 9.097E-002 * X + 7.695E-004$   
 $X = 1.099E+001 * Y - 8.459E-003$   
DL = 1.333E-02 ppb  
BEC = 8.459E-03 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 118 Sn                72      ppb

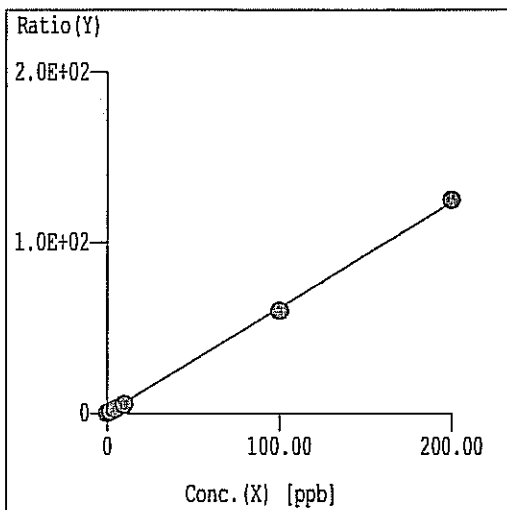


	Rt	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	52.22	2.963E-02	P	16.06
2		2.000	2.031	1433	8.054E-01	P	3.349
3		5.000	4.800	3435	1.863E+00	P	4.335
4		10.00	9.720	7056	3.743E+00	P	5.537
5		100.0	91.64	6.737E+04	3.504E+01	P	2.134
6		200.0	204.2	1.402E+05	7.804E+01	P	3.097
7		50.00					
8							
9							
10							
11							
12							
13							
14							
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17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9988$   
 $Y = 3.820E-001 \cdot X + 2.963E-002$   
 $X = 2.618E+000 \cdot Y - 7.756E-002$   
DL = 3.738E-02 ppb  
BEC = 7.756E-02 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 121 Sb                72      ppb



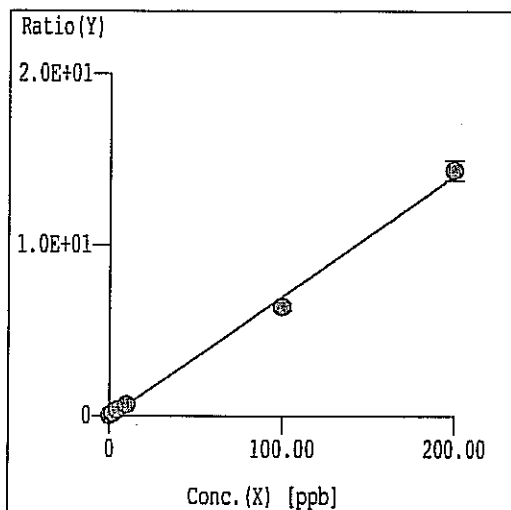
	Rt	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	15.56	2.521E-02	P	39.03
2		2.000	1.362	552.2	8.677E-01	P	1.738
3		5.000	3.757	1509	2.349E+00	P	2.939
4		10.00	8.356	3447	5.195E+00	P	3.834E-01
5		100.0	96.80	4.022E+04	5.991E+01	P	6.464E-01
6		200.0	201.7	8.008E+04	1.248E+02	P	3.948E-01
7		50.00					
8							
9							
10							
11							
12							
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17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9998$   
 $Y = 6.187E-001 \cdot X + 2.521E-002$   
 $X = 1.616E+000 \cdot Y - 4.075E-002$   
DL = 4.771E-02 ppb  
BEC = 4.075E-02 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 135 Ba            115    ppb

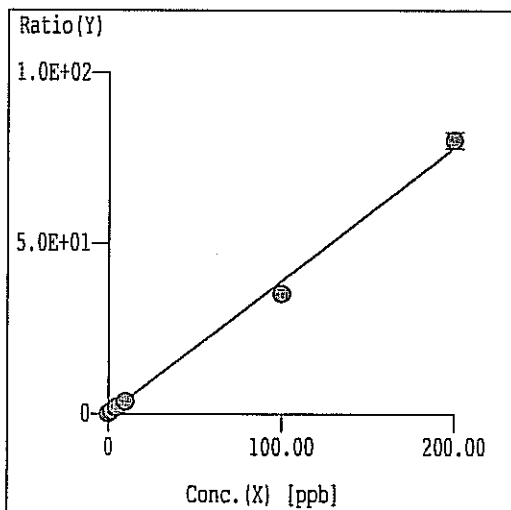


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.311	22.22	7.729E-03	P	50.38
2		2.000	3.257	432.2	1.455E-01	P	10.66
3		5.000	6.270	1099	3.587E-01	P	6.151
4		10.00	10.52	2082	6.599E-01	P	11.47
5		100.0	91.42	2.029E+04	6.386E+00	P	3.455
6		200.0	204.2	4.183E+04	1.437E+01	P	4.112
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9986$   
 $Y = 7.079E-002 * X - 8.510E-002$   
 $X = 1.413E+001 * Y + 1.202E+000$   
DL = 1.650E-01 ppb  
BEC = -1.202E+00 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 203 Tl            209    ppb



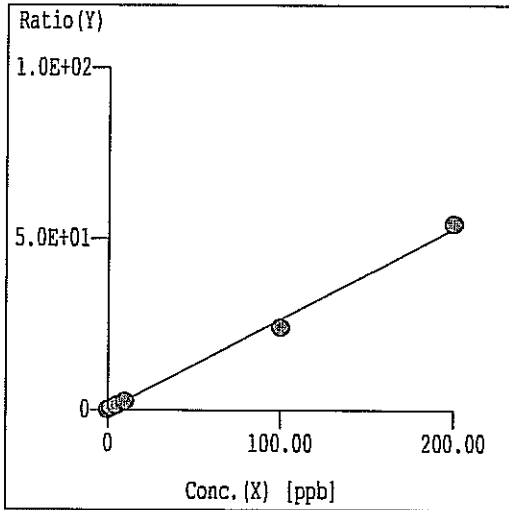
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	27.78	1.691E-02	P	3.678
2		2.000	1.913	1248	7.662E-01	P	10.39
3		5.000	4.710	3115	1.861E+00	P	6.259
4		10.00	9.094	6180	3.578E+00	P	1.072
5		100.0	90.00	6.073E+04	3.526E+01	P	1.758
6		200.0	205.1	1.259E+05	8.031E+01	P	2.957
7		50.00					
8							
9							
10							
11							
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16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9983$   
 $Y = 3.916E-001 * X + 1.691E-002$   
 $X = 2.554E+000 * Y - 4.319E-002$   
DL = 4.765E-03 ppb  
BEC = 4.319E-02 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
 (1) 207 Pb              209    ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	73.34	4.483E-02	P	15.05
2		2.000	1.986	932.3	5.713E-01	P	2.612
3		5.000	4.743	2178	1.302E+00	P	7.263
4		10.00	9.146	4262	2.470E+00	P	4.425
5		100.0	90.62	4.144E+04	2.407E+01	P	2.583
6		200.0	204.7	8.514E+04	5.432E+01	P	1.597
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
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17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9985$   
 $Y = 2.651E-001 * X + 4.483E-002$   
 $X = 3.772E+000 * Y - 1.691E-001$   
 DL = 7.632E-02 ppb  
 BEC = 1.691E-01 ppb

Weight: OFF  
 Min Conc: 0.000

Last Calib: Feb 28, 2008 12:10 pm  
 Calibration Type: External Calibration Method  
 Calibration Title: ICP\_OR.S  
 Weighting Method: 1/(SD\*SD)  
 Mass Interpolation Fit for VIS: Point to Point  
 Method: C:\ICPCHEM\1\METHODS\ICP\_OR.S.M  
 Multi Tune: #1 012807a5.u  
 #2 012807ha.u

=== Standard Files ===

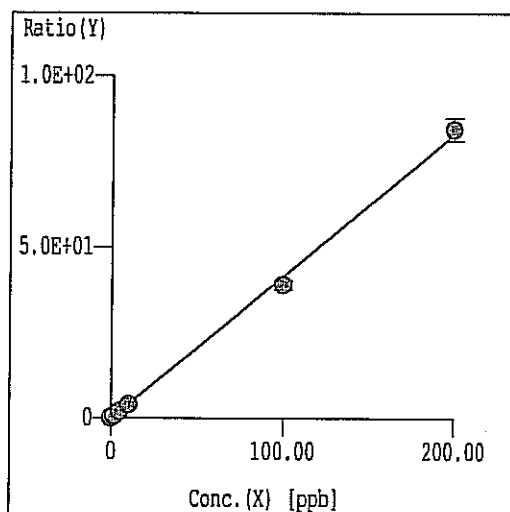
<Data Correction>

Bkg File: --  
 Rejected Masses: --  
 Interference Correction: ON

	Data File	Sample Name	Date Acquired
1	c:\icpchem\1\data\08b21\00.b\011calb.d\011calb.d#	CAL BLK	Feb 21 2008 12:26 pm
2	c:\icpchem\1\data\08b21\00.b\004cals.d\004cals.d#	2/10/200	Feb 21 2008 11:44 am
3	c:\icpchem\1\data\08b21\00.b\005cals.d\005cals.d#	5/25/500	Feb 21 2008 11:50 am
4	c:\icpchem\1\data\08b21\00.b\006cals.d\006cals.d#	10/50/1000	Feb 21 2008 11:56 am
5	c:\icpchem\1\data\08b21\00.b\007cals.d\007cals.d#	100/500/10K	Feb 21 2008 12:02 pm
6	c:\icpchem\1\data\08b21\00.b\008cals.d\008cals.d#	200/1000/20K	Feb 21 2008 12:08 pm
7	---		
8	---		
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18	---		
19	---		
20	---		

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 9 Be                    6       ppb

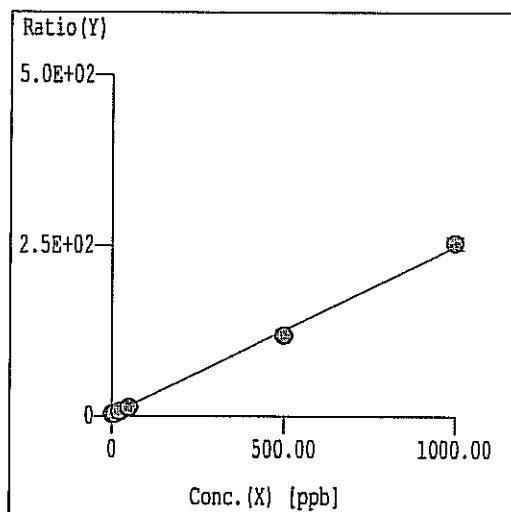


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	32.22	1.659E-02	P	76.47
2		2.000	1.769	1598	7.516E-01	P	6.638
3		5.000	4.870	3994	2.041E+00	P	8.520
4		10.00	9.383	7721	3.916E+00	P	6.825
5		100.0	93.78	7.603E+04	3.899E+01	P	3.568
6		200.0	203.1	1.517E+05	8.444E+01	P	3.982
7		50.00					
8							
9							
10							
11							
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17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9993$   
 $Y = 4.156E-001 * X + 1.659E-002$   
 $X = 2.406E+000 * Y - 3.991E-002$   
DL = 9.157E-02 ppb  
BEC = 3.991E-02 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 11 B                    6       ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	5157	2.640E+00	P	7.828
2		10.00	3.398E-02	5636	2.648E+00	P	7.662E-01
3		25.00	16.49	1.314E+04	6.708E+00	P	3.129
4		50.00	39.86	2.460E+04	1.247E+01	P	3.932
5		500.0	466.6	2.296E+05	1.177E+02	P	2.409
6		1000	1018	4.556E+05	2.536E+02	P	3.819
7		250.0					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

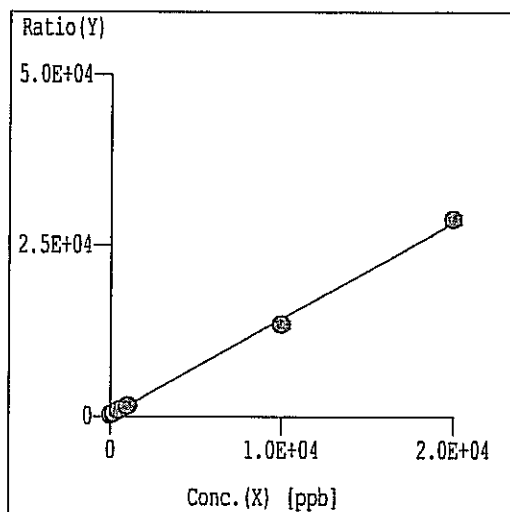
Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9993$   
 $Y = 2.466E-001 * X + 2.640E+000$   
 $X = 4.055E+000 * Y - 1.070E+001$   
DL = 2.514 ppb  
BEC = 10.70 ppb

Weight: OFF  
Min Conc: 0.000



=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 23 Na                72     ppb

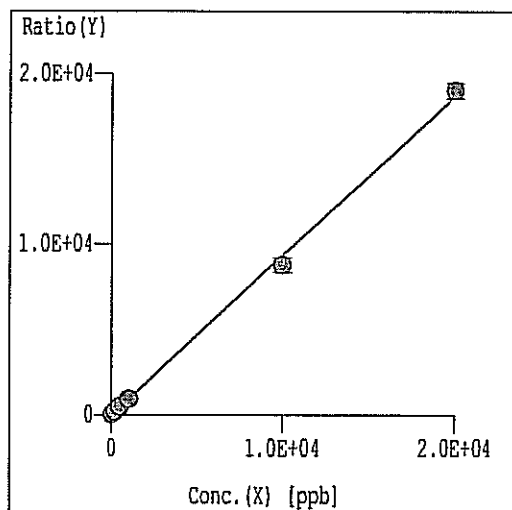


	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	4.138E+05	1.952E+02	P	1.487
2		200.0	188.5	1.061E+06	4.610E+02	A	1.905
3		500.0	512.4	1.946E+06	9.178E+02	A	3.000
4		1000	960.8	3.357E+06	1.550E+03	A	4.987
5		1.000E+04	9402	2.902E+07	1.345E+04	A	4.358
6		2.000E+04	2.030E+04	5.730E+07	2.882E+04	A	2.565
7		5000					
8							
9							
10							
11							
12							
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20							

Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9994$   
 $Y = 1.410E+000 \cdot X + 1.952E+002$   
 $X = 7.091E-001 \cdot Y - 1.384E+002$   
DL = 6.176 ppb  
BEC = 138.4 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 24 Mg                72     ppb



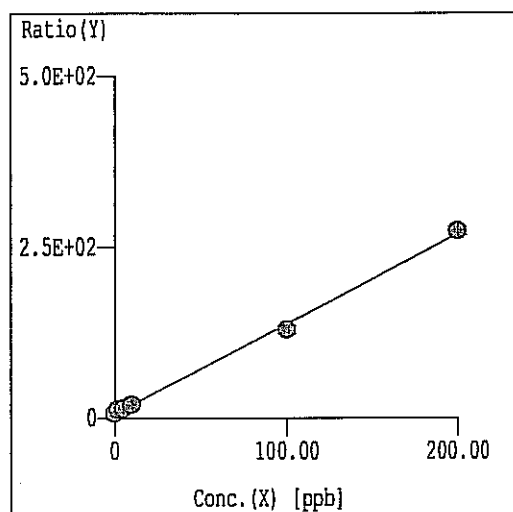
	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	1.061E+04	5.003E+00	P	8.233E-01
2		200.0	198.0	4.375E+05	1.901E+02	P	1.630
3		500.0	510.8	1.023E+06	4.825E+02	A	2.858
4		1000	981.8	1.998E+06	9.228E+02	A	5.358
5		1.000E+04	9367	1.889E+07	8.762E+03	A	4.884
6		2.000E+04	2.032E+04	3.777E+07	1.900E+04	A	2.402
7		5000					
8							
9							
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11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9993$   
 $Y = 9.348E-001 \cdot X + 5.003E+000$   
 $X = 1.070E+000 \cdot Y - 5.352E+000$   
DL = 1.322E-01 ppb  
BEC = 5.352 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 27 Al                72    ppb

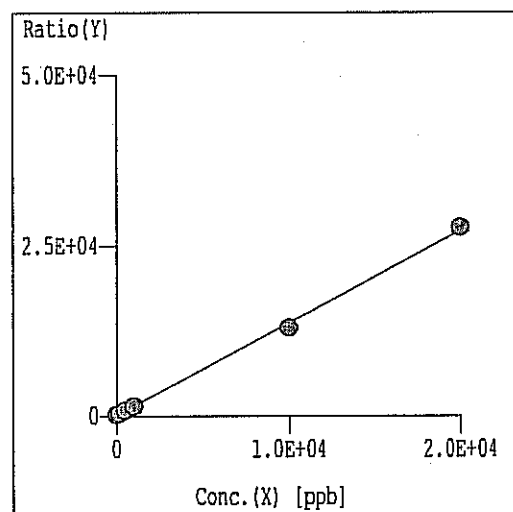


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.818E-01	1.498E+04	7.072E+00	P	7.427
2		2.000	4.775	3.023E+04	1.311E+01	P	27.45
3		5.000	5.376	2.944E+04	1.390E+01	P	6.213
4		10.00	9.933	4.303E+04	1.988E+01	P	7.318
5		100.0	93.54	2.797E+05	1.297E+02	P	4.268
6		200.0	203.2	5.443E+05	2.738E+02	P	2.253
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
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17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9991$   
 $Y = 1.314E+000 \cdot X + 6.833E+000$   
 $X = 7.612E-001 \cdot Y - 5.202E+000$   
DL = 1.199 ppb  
BEC = 5.202 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 39 K                72    ppb



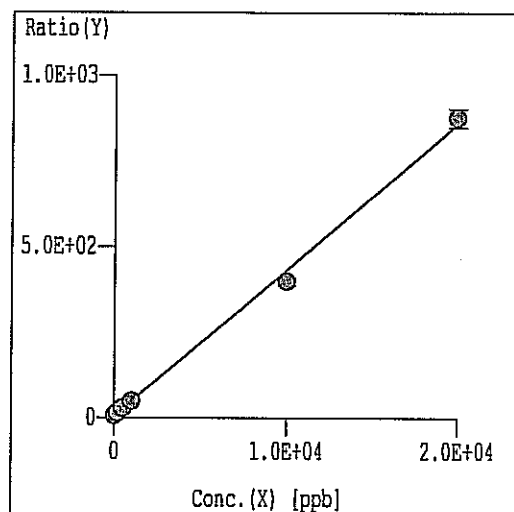
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	3.129E+05	1.476E+02	P	2.419
2		200.0	167.8	8.637E+05	3.753E+02	A	1.738
3		500.0	490.0	1.722E+06	8.125E+02	A	3.671
4		1000	949.9	3.110E+06	1.436E+03	A	5.295
5		1.000E+04	9442	2.795E+07	1.296E+04	A	2.971
6		2.000E+04	2.028E+04	5.500E+07	2.767E+04	A	2.159
7		5000					
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9							
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Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9995$   
 $Y = 1.357E+000 \cdot X + 1.476E+002$   
 $X = 7.370E-001 \cdot Y - 1.088E+002$   
DL = 7.894 ppb  
BEC = 108.8 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 44 Ca                72     ppb

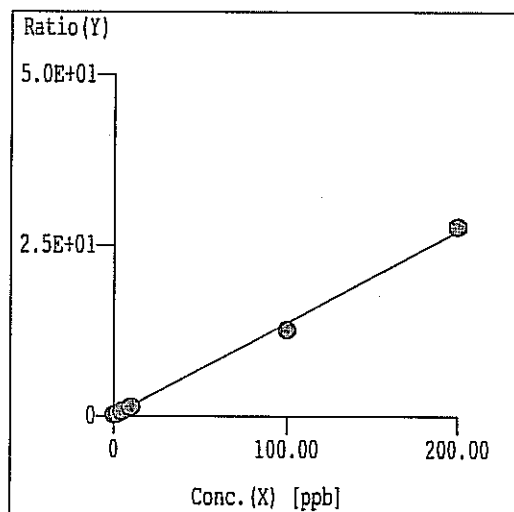


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	1.314E+04	6.199E+00	P	5.491
2		200.0	197.5	3.364E+04	1.462E+01	P	2.415
3		500.0	528.8	6.093E+04	2.875E+01	P	4.101
4		1000	1000	1.058E+05	4.885E+01	P	4.926
5		1.000E+04	9206	8.602E+05	3.988E+02	A	3.037
6		2.000E+04	2.040E+04	1.741E+06	8.760E+02	A	3.105
7		5000					
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9							
10							
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12							
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18							
19							
20							

Curve Fit       $Y=aX+[blank]$   
 $r = 0.9989$   
 $Y = 4.264E-002 * X + 6.199E+000$   
 $X = 2.345E+001 * Y - 1.454E+002$   
DL = 23.95 ppb  
BEC = 145.4 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 47 Ti                72     ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	309.7	1.490E-01	P	146.1
2		2.000	7.510E-01	575.6	2.504E-01	P	11.85
3		5.000	3.973	1451	6.855E-01	P	9.656
4		10.00	8.505	2813	1.297E+00	P	2.630
5		100.0	92.11	2.715E+04	1.259E+01	P	2.674
6		200.0	204.1	5.507E+04	2.770E+01	P	2.414
7		50.00					
8							
9							
10							
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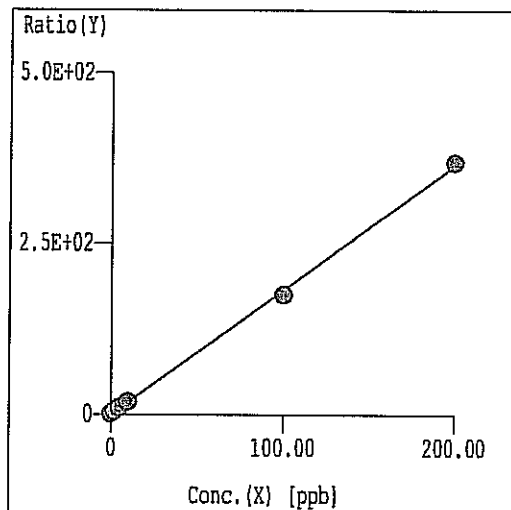
Curve Fit       $Y=aX+[blank]$   
 $r = 0.9990$   
 $Y = 1.350E-001 * X + 1.490E-001$   
 $X = 7.406E+000 * Y - 1.103E+000$   
DL = 4.836 ppb  
BEC = 1.103 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element  
(2) 51 V

ISTD Unit  
72 ppb



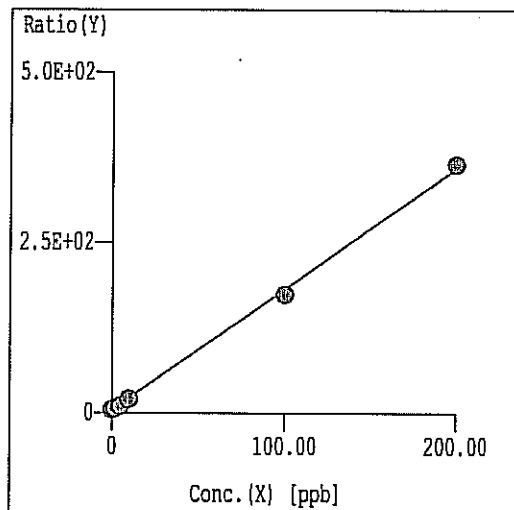
	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	5.074E-01	661.1	8.536E-01	P	9.278
2		2.000	2.709	3661	4.875E+00	P	2.066
3		5.000	5.577	7502	1.011E+01	P	1.218
4		10.00	10.25	1.384E+04	1.864E+01	P	5.467E-01
5		100.0	95.99	1.310E+05	1.752E+02	P	2.905E-01
6		200.0	202.0	2.605E+05	3.688E+02	P	6.571E-01
7		50.00					
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Curve Fit:  $Y=aX+b$   
 $r = 0.9997$   
 $Y = 1.826E+000 \cdot X - 7.313E-002$   
 $X = 5.475E-001 \cdot Y + 4.004E-002$   
 $DL = 1.301E-01$  ppb  
 $BEC = -4.004E-02$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element  
(2) 52 Cr

ISTD Unit  
72 ppb



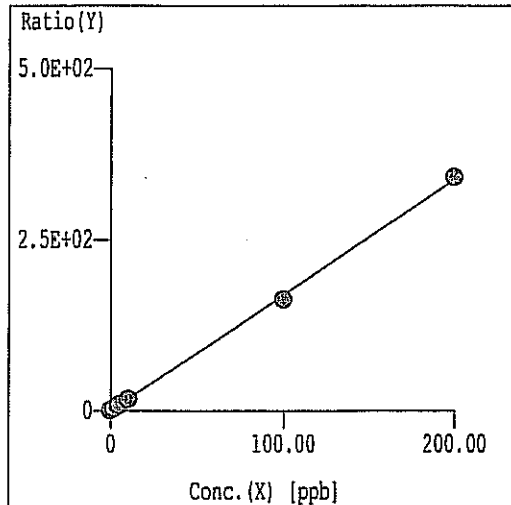
	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	3368	4.351E+00	P	4.180E-01
2		2.000	1.063	4682	6.239E+00	P	3.639
3		5.000	2.989	7166	9.661E+00	P	8.191E-01
4		10.00	8.730	1.475E+04	1.986E+01	P	2.000
5		100.0	95.03	1.295E+05	1.732E+02	P	5.574E-01
6		200.0	202.6	2.574E+05	3.643E+02	P	6.405E-01
7		50.00					
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19							
20							

Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9996$   
 $Y = 1.777E+000 \cdot X + 4.351E+000$   
 $X = 5.628E-001 \cdot Y - 2.449E+000$   
 $DL = 3.071E-02$  ppb  
 $BEC = 2.449$  ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 55 Mn                72      ppb

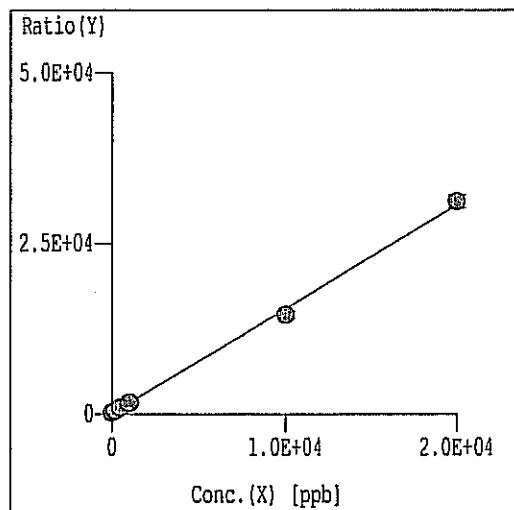


	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	515.6	6.660E-01	P 6.995
2		2.000	1.963	2988	3.979E+00	P 3.535
3		5.000	4.763	6457	8.705E+00	P 1.490
4		10.00	9.728	1.269E+04	1.709E+01	P 2.556
5		100.0	96.02	1.217E+05	1.627E+02	P 7.256E-01
6		200.0	202.0	2.414E+05	3.416E+02	P 3.107E-01
7		50.00				
8						
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Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9997$   
 $Y = 1.688E+000 \cdot X + 6.660E-001$   
 $X = 5.925E-001 \cdot Y - 3.946E-001$   
DL = 8.281E-02 ppb  
BEC = 3.946E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 56 Fe                72      ppb



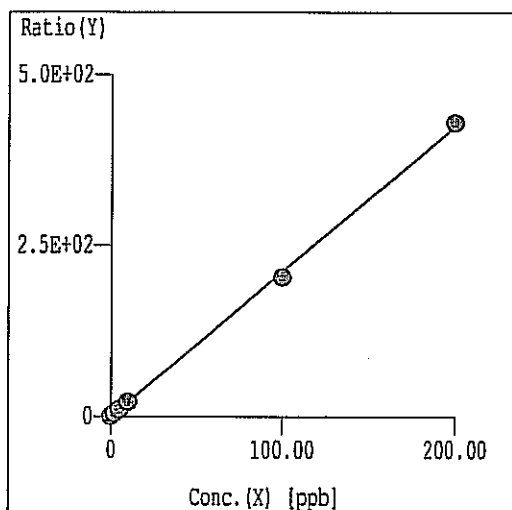
	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	4.367E+05	2.059E+02	P 1.793
2		200.0	161.5	1.040E+06	4.521E+02	A 1.075
3		500.0	483.7	2.000E+06	9.433E+02	A 3.344
4		1000	941.3	3.555E+06	1.641E+03	A 4.059
5		1.000E+04	9391	3.133E+07	1.452E+04	A 3.356
6		2.000E+04	2.031E+04	6.196E+07	3.117E+04	A 3.088
7		5000				
8						
9						
10						
11						
12						
13						
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16						
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18						
19						
20						

Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9994$   
 $Y = 1.525E+000 \cdot X + 2.059E+002$   
 $X = 6.559E-001 \cdot Y - 1.351E+002$   
DL = 7.267 ppb  
BEC = 135.1 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 59 Co                72    ppb

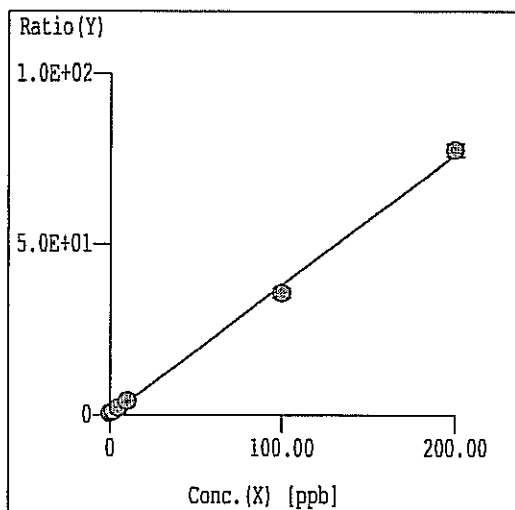


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	102.2	1.321E-01	P	20.99
2		2.000	1.995	3280	4.369E+00	P	2.709
3		5.000	4.896	7813	1.053E+01	P	1.063
4		10.00	9.907	1.573E+04	2.118E+01	P	2.278
5		100.0	95.70	1.521E+05	2.034E+02	P	2.699E-01
6		200.0	202.2	3.035E+05	4.295E+02	P	1.514E-01
7		50.00					
8							
9							
10							
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13							
14							
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16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9997$   
 $Y = 2.124E+000 \cdot X + 1.321E-001$   
 $X = 4.708E-001 \cdot Y - 6.219E-002$   
DL = 3.916E-02 ppb  
BEC = 6.219E-02 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 60 Ni                72    ppb



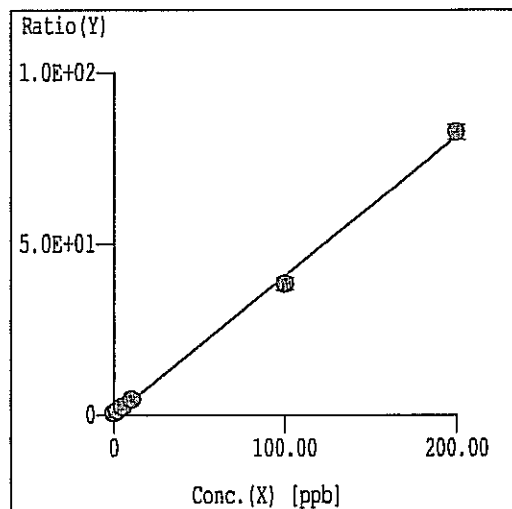
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.349	1018	4.803E-01	P	8.692
2		2.000	2.703	2294	9.972E-01	P	5.718
3		5.000	5.496	4369	2.063E+00	P	9.343
4		10.00	10.78	8837	4.082E+00	P	5.931
5		100.0	93.45	7.687E+04	3.564E+01	P	3.993
6		200.0	203.2	1.541E+05	7.754E+01	P	2.468
7		50.00					
8							
9							
10							
11							
12							
13							
14							
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17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9992$   
 $Y = 3.817E-001 \cdot X - 3.477E-002$   
 $X = 2.620E+000 \cdot Y + 9.109E-002$   
DL = 3.281E-01 ppb  
BEC = -9.109E-02 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 65 Cu                72      ppb

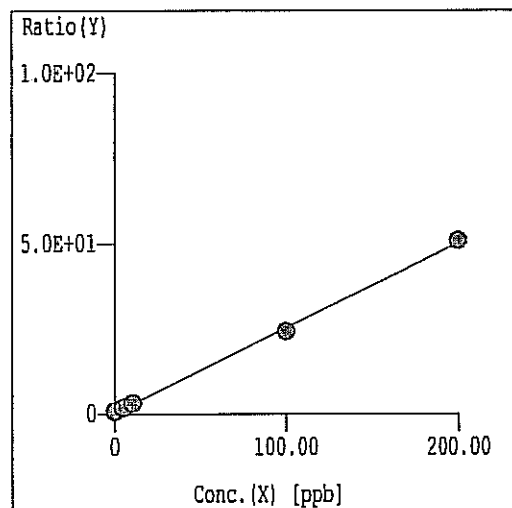


	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	8.040E-01	1157	5.452E-01	P 2.477
2		2.000	2.752	3076	1.337E+00	P 2.769
3		5.000	5.683	5357	2.528E+00	P 5.533
4		10.00	10.78	9957	4.600E+00	P 6.972
5		100.0	94.08	8.292E+04	3.845E+01	P 4.676
6		200.0	202.9	1.643E+05	8.267E+01	P 2.651
7		50.00				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:       $Y=aX+b$   
 $r = 0.9993$   
 $Y = 4.064E-001 * X + 2.185E-001$   
 $X = 2.461E+000 * Y - 5.377E-001$   
DL = 9.969E-02 ppb  
BEC = 5.377E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 66 Zn                72      ppb



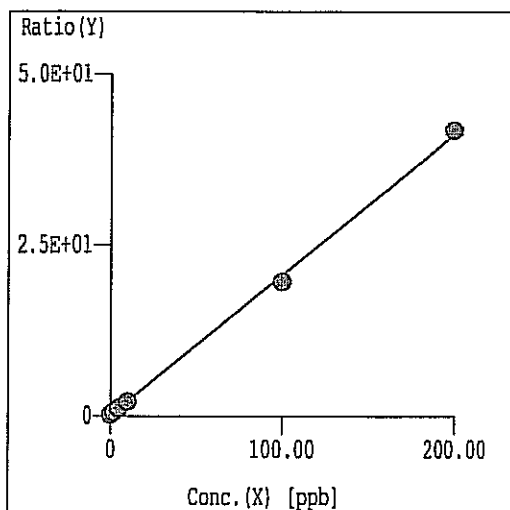
	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	7.952E-01	476.7	6.158E-01	P 1.467
2	ON	2.000		876.7	1.167E+00	P 6.560
3		5.000	5.589	1345	1.813E+00	P 3.820
4		10.00	10.99	2349	3.163E+00	P 2.615
5		100.0	95.38	1.812E+04	2.424E+01	P 1.032
6		200.0	202.2	3.598E+04	5.094E+01	P 1.709
7						
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10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:       $Y=aX+b$   
 $r = 0.9995$   
 $Y = 2.498E-001 * X + 4.172E-001$   
 $X = 4.003E+000 * Y - 1.670E+000$   
DL = 1.085E-01 ppb  
BEC = 1.670 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 75 As                72     ppb

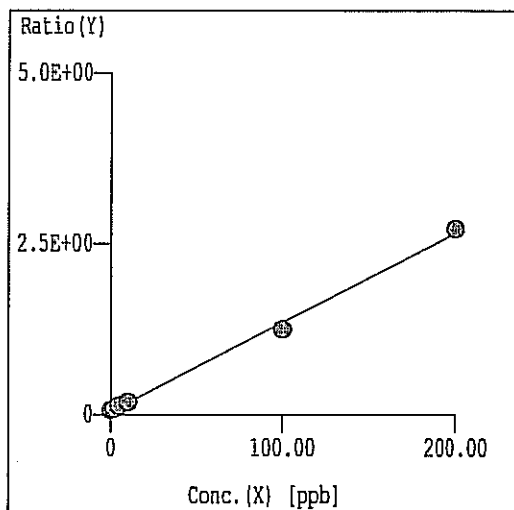


	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	130.0	1.677E-01	P	18.52
2		2.000	1.990	433.0	5.765E-01	P	7.031
3		5.000	4.862	865.2	1.166E+00	P	1.094
4		10.00	9.499	1574	2.119E+00	P	3.147
5		100.0	94.88	1.470E+04	1.966E+01	P	1.365
6		200.0	202.6	2.952E+04	4.178E+01	P	1.322
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9995$   
 $Y = 2.054E-001 \cdot X + 1.677E-001$   
 $X = 4.868E+000 \cdot Y - 8.163E-001$   
DL = 4.534E-01 ppb  
BEC = 8.163E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 82 Se                72     ppb



	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.519	134.1	6.321E-02	P	5.202E-01
2		2.000	2.771	183.3	7.963E-02	P	4.854
3		5.000	6.438	270.7	1.277E-01	P	1.943
4		10.00	10.49	391.5	1.808E-01	P	5.366
5		100.0	91.69	2686	1.245E+00	P	1.283
6		200.0	204.1	5402	2.717E+00	P	1.440
7		50.00					
8							
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10							
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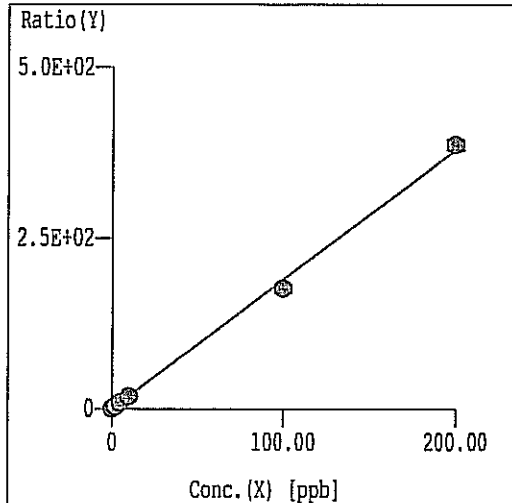
Curve Fit:       $Y=aX+b$   
 $r = 0.9986$   
 $Y = 1.310E-002 \cdot X + 4.332E-002$   
 $X = 7.632E+001 \cdot Y - 3.306E+000$   
DL = 7.530E-02 ppb  
BEC = 3.306 ppb

Weight: OFF  
Min Conc: 0.000



## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 88 Sr                72      ppb

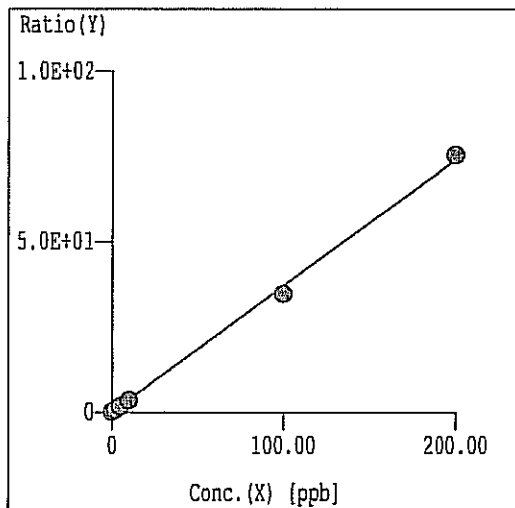


	Rt	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	351.1	1.656E-01	P	3.478
2		2.000	1.752	8031	3.491E+00	P	2.864
3		5.000	4.836	1.981E+04	9.345E+00	P	2.879
4		10.00	9.497	3.940E+04	1.819E+01	P	4.579
5		100.0	92.67	3.797E+05	1.761E+02	P	3.617
6		200.0	203.7	7.689E+05	3.868E+02	P	2.057
7		50.00					
8							
9							
10							
11							
12							
13							
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Curve Fit:       $Y=aX+[\text{blank}]$   
 $r = 0.9991$   
 $Y = 1.898E+000 \cdot X + 1.656E-001$   
 $X = 5.269E-001 \cdot Y - 8.724E-002$   
DL = 9.103E-03 ppb  
BEC = 8.724E-02 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 95 Mo                72      ppb



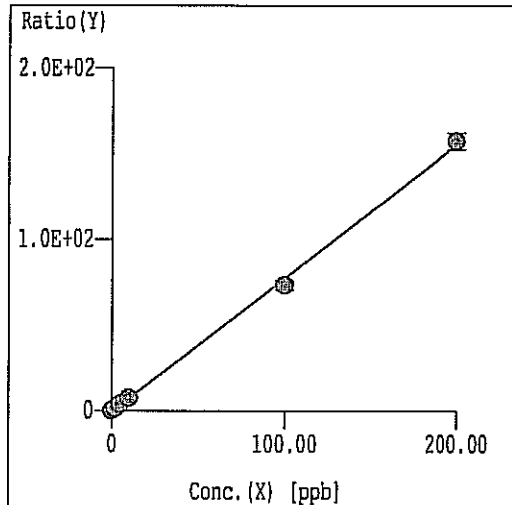
	Rt	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	245.6	1.159E-01	P	10.59
2		2.000	1.523	1565	6.800E-01	P	2.793
3		5.000	4.500	3778	1.783E+00	P	5.037
4		10.00	9.133	7582	3.500E+00	P	3.091
5		100.0	93.23	7.476E+04	3.466E+01	P	2.631
6		200.0	203.4	1.501E+05	7.549E+01	P	9.365E-01
7		50.00					
8							
9							
10							
11							
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19							
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Curve Fit:       $Y=aX+[\text{blank}]$   
 $r = 0.9992$   
 $Y = 3.705E-001 \cdot X + 1.159E-001$   
 $X = 2.699E+000 \cdot Y - 3.127E-001$   
DL = 9.938E-02 ppb  
BEC = 3.127E-01 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD      Unit  
(1) 109 Ag                72        ppb

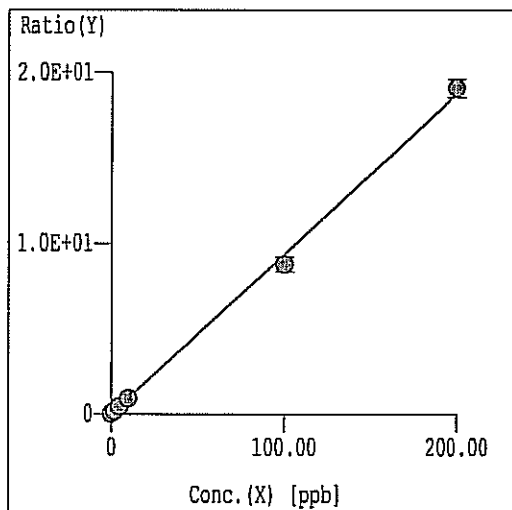


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	8.452E-01	236.7	1.115E-01	P	13.08
2		2.000	2.600	3405	1.479E+00	P	1.497
3		5.000	5.837	8483	4.002E+00	P	4.890
4		10.00	10.35	1.629E+04	7.523E+00	P	5.206
5		100.0	94.82	1.582E+05	7.336E+01	P	3.687
6		200.0	202.5	3.127E+05	1.573E+02	P	3.085
7		50.00					
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9							
10							
11							
12							
13							
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Curve Fit:       $Y=aX+b$   
 $r = 0.9995$   
 $Y = 7.794E-001 * X - 5.473E-001$   
 $X = 1.283E+000 * Y + 7.022E-001$   
DL = 5.613E-02 ppb  
BEC = -7.022E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD      Unit  
(1) 111 Cd                115        ppb



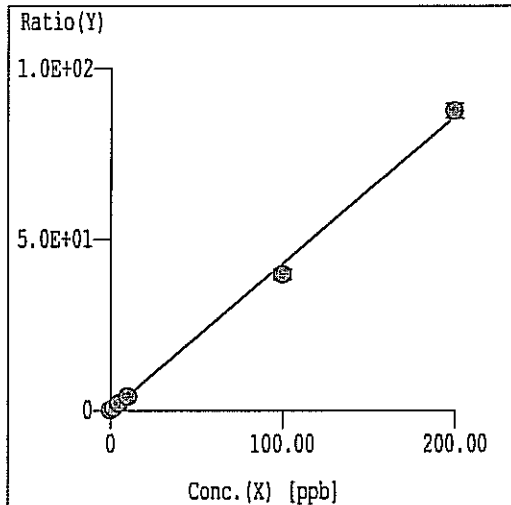
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	15.93	4.319E-03	P	20.17
2		2.000	1.689	654.8	1.630E-01	P	7.442
3		5.000	4.760	1670	4.514E-01	P	3.352
4		10.00	9.702	3429	9.157E-01	P	3.836
5		100.0	93.40	3.301E+04	8.778E+00	P	4.921
6		200.0	203.3	6.613E+04	1.910E+01	P	2.818
7		50.00					
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9							
10							
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19							
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Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9993$   
 $Y = 9.393E-002 * X + 4.319E-003$   
 $X = 1.065E+001 * Y - 4.598E-002$   
DL = 2.782E-02 ppb  
BEC = 4.598E-02 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 118 Sn                72      ppb

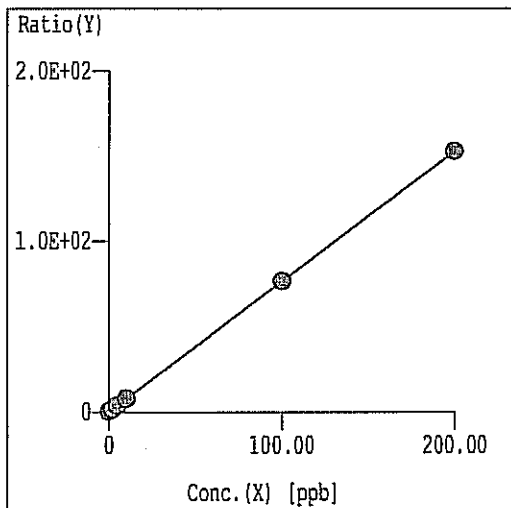


	Rjct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	173.3	8.183E-02	P	20.18
2		2.000	1.647	1817	7.893E-01	P	6.089
3		5.000	4.711	4464	2.106E+00	P	4.529
4		10.00	9.301	8833	4.079E+00	P	4.657
5		100.0	92.40	8.581E+04	3.979E+01	P	3.836
6		200.0	203.8	1.743E+05	8.768E+01	P	2.489
7		50.00					
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9							
10							
11							
12							
13							
14							
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19							
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Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9990$   
 $Y = 4.297E-001 \cdot X + 8.183E-002$   
 $X = 2.327E+000 \cdot Y - 1.904E-001$   
DL = 1.153E-01 ppb  
BEC = 1.904E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 121 Sb                72      ppb



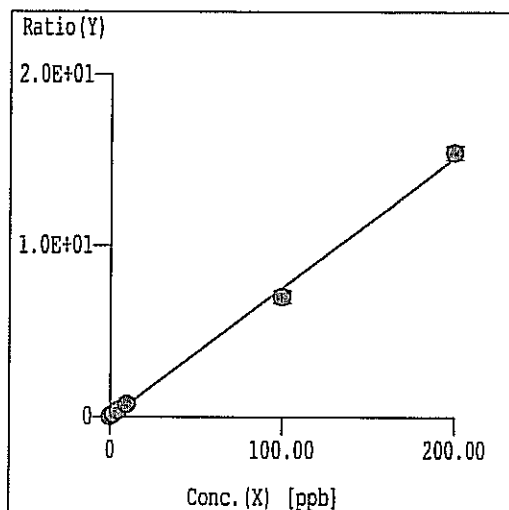
	Rjct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	277.8	3.590E-01	P	4.507
2		2.000	1.582	1175	1.564E+00	P	5.039
3		5.000	4.657	2897	3.906E+00	P	1.080
4		10.00	9.845	5834	7.857E+00	P	1.258
5		100.0	99.96	5.718E+04	7.648E+01	P	7.296E-01
6		200.0	200.0	1.079E+05	1.527E+02	P	3.585E-01
7		50.00					
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10							
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12							
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14							
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19							
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Curve Fit:       $Y=aX+[blank]$   
 $r = 1.0000$   
 $Y = 7.616E-001 \cdot X + 3.590E-001$   
 $X = 1.313E+000 \cdot Y - 4.714E-001$   
DL = 6.374E-02 ppb  
BEC = 4.714E-01 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 135 Ba            115    ppb

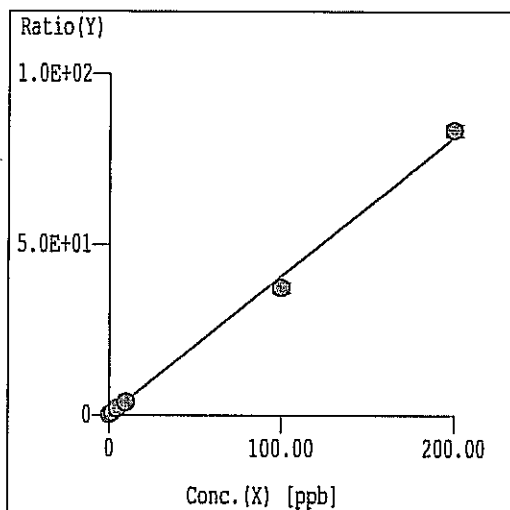


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.134	30.00	8.172E-03	P	40.56
2		2.000	2.958	592.3	1.473E-01	P	6.049
3		5.000	5.880	1370	3.702E-01	P	2.746
4		10.00	10.67	2753	7.353E-01	P	5.740
5		100.0	92.85	2.634E+04	7.006E+00	P	5.197
6		200.0	203.5	5.348E+04	1.545E+01	P	2.585
7		50.00					
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19							
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Curve Fit       $Y=aX+b$   
 $r = 0.9990$   
 $Y = 7.629E-002 * X - 7.838E-002$   
 $X = 1.311E+001 * Y + 1.027E+000$   
DL = 1.303E-01 ppb  
BEC = -1.027E+00 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 203 Tl            209    ppb



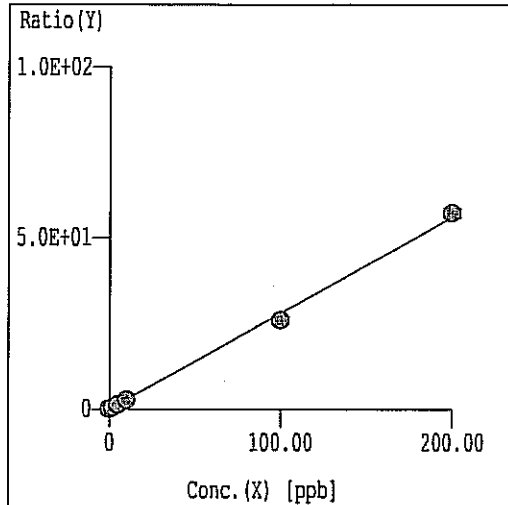
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	227.8	1.110E-01	P	8.213
2		2.000	1.484	1650	7.161E-01	P	8.096
3		5.000	4.574	4141	1.976E+00	P	2.248
4		10.00	9.076	8083	3.812E+00	P	1.790
5		100.0	91.36	7.837E+04	3.736E+01	P	4.004
6		200.0	204.4	1.577E+05	8.345E+01	P	2.126
7		50.00					
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19							
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Curve Fit       $Y=aX+[blank]$   
 $r = 0.9987$   
 $Y = 4.077E-001 * X + 1.110E-001$   
 $X = 2.452E+000 * Y - 2.723E-001$   
DL = 6.709E-02 ppb  
BEC = 2.723E-01 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD      Unit  
(1) 207 Pb                209      ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	111.1	5.406E-02	P	4.639
2		2.000	1.674	1207	5.241E-01	P	2.564
3		5.000	4.672	2860	1.366E+00	P	4.203
4		10.00	9.615	5834	2.754E+00	P	5.266
5		100.0	92.44	5.456E+04	2.601E+01	P	3.918
6		200.0	203.8	1.082E+05	5.728E+01	P	2.422
7		50.00					
8							
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10							
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19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9990$   
 $Y = 2.808E-001 \cdot X + 5.406E-002$   
 $X = 3.561E+000 \cdot Y - 1.925E-001$   
DL = 2.680E-02 ppb  
BEC = 1.925E-01 ppb

Weight: OFF  
Min Conc: 0.000

Last Calib: Feb 28, 2008 12:10 pm  
 Calibration Type: External Calibration Method  
 Calibration Title: ICP\_OR5  
 Weighing Method: 1/(SD\*SD)  
 Mass Interpolation Fit for VIS: Point to Point  
 Method: C:\ICPCHEM\1\METHODS\ICP\_OR5.M  
 Multi Tune: #1 012807a5.u  
 #2 012807he.u

## === Standard Files ===

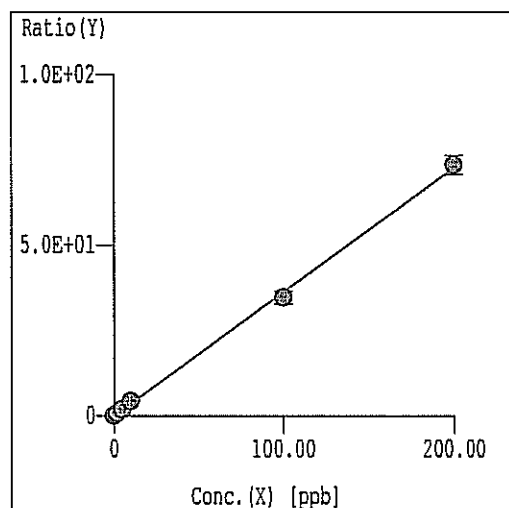
&lt;Data Correction&gt;

Bkg File: —  
 Rejected Masses: —  
 Interference Correction: ON

	Data File	Sample Name	Date Acquired
1	c:\icpchem\1\data\08b22m00.b\003calb.d\003calb.d#	CAL BLK	Feb 22 2008 12:16 pm
2	c:\icpchem\1\data\08b22m00.b\004cals.d\004cals.d#	2/10/200	Feb 22 2008 12:22 pm
3	c:\icpchem\1\data\08b22m00.b\005cals.d\005cals.d#	5/25/500	Feb 22 2008 12:28 pm
4	c:\icpchem\1\data\08b22m00.b\006cals.d\006cals.d#	10/50/1000	Feb 22 2008 12:34 pm
5	c:\icpchem\1\data\08b22m00.b\007cals.d\007cals.d#	100/500/10K	Feb 22 2008 12:40 pm
6	c:\icpchem\1\data\08b22m00.b\008cals.d\008cals.d#	200/1000/20K	Feb 22 2008 12:46 pm
7	---		
8	---		
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18	---		
19	---		
20	---		

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 9 Be                6       ppb

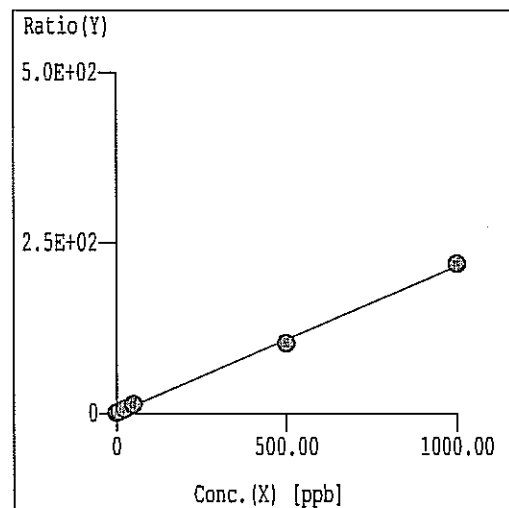


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	4.445	2.219E-03	P	86.70
2		2.000	2.103	1566	7.662E-01	P	3.978
3		5.000	5.341	3976	1.943E+00	P	5.733
4		10.00	11.87	9054	4.315E+00	P	4.607
5		100.0	95.46	6.878E+04	3.469E+01	P	5.392
6		200.0	202.2	1.391E+05	7.346E+01	P	3.844
7		50.00					
8							
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10							
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19							
20							

Curve Fit:       $Y=aX+[\text{blank}]$   
 $r = 0.9996$   
 $Y = 3.633E-001 \cdot X + 2.219E-003$   
 $X = 2.752E+000 \cdot Y - 6.108E-003$   
DL = 1.589E-02 ppb  
BEC = 6.108E-03 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 11 B                6       ppb



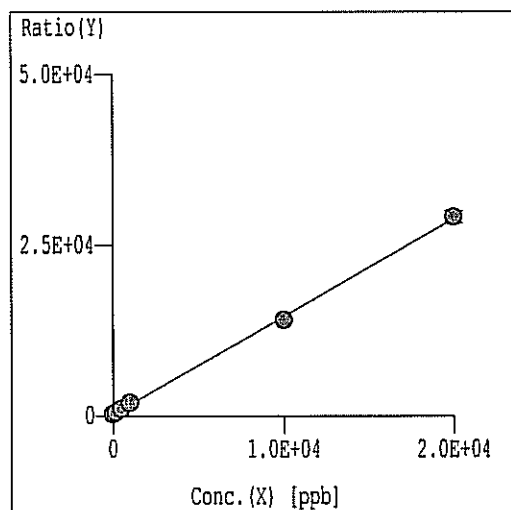
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	1570	7.696E-01	P	13.52
2		10.00	9.678	5839	2.854E+00	P	3.577
3		25.00	25.42	1.280E+04	6.246E+00	P	1.515
4		50.00	58.81	2.820E+04	1.344E+01	P	2.889
5		500.0	472.7	2.036E+05	1.026E+02	P	1.779
6		1000	1013	4.150E+05	2.190E+02	P	1.853
7		250.0					
8							
9							
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19							
20							

Curve Fit:       $Y=aX+[\text{blank}]$   
 $r = 0.9994$   
 $Y = 2.154E-001 \cdot X + 7.696E-001$   
 $X = 4.642E+000 \cdot Y - 3.573E+000$   
DL = 1.449 ppb  
BEC = 3.573 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 23 Na                72     ppb

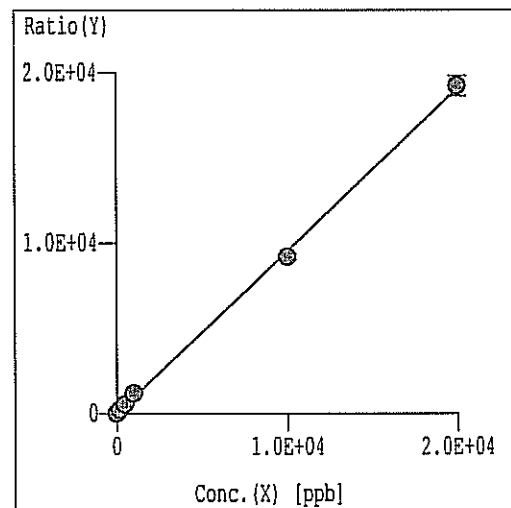


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	4.239E+05	2.455E+02	P	2.846
2		200.0	209.7	9.401E+05	5.462E+02	A	2.941
3		500.0	548.9	1.793E+06	1.033E+03	A	1.636
4		1000	1177	3.501E+06	1.932E+03	A	2.565
5		1.000E+04	9633	2.445E+07	1.406E+04	A	1.990
6		2.000E+04	2.017E+04	4.867E+07	2.917E+04	A	3.102
7		5000					
8							
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Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9997$   
 $Y = 1.434E+000 \cdot X + 2.455E+002$   
 $X = 6.975E-001 \cdot Y - 1.713E+002$   
DL = 14.62 ppb  
BEC = 171.3 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 24 Mg                72     ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	5789	3.361E+00	P	17.71
2		200.0	236.2	3.933E+05	2.285E+02	P	3.713
3		500.0	572.2	9.532E+05	5.489E+02	A	2.729
4		1000	1240	2.148E+06	1.186E+03	A	2.861
5		1.000E+04	9636	1.598E+07	9.190E+03	A	1.970
6		2.000E+04	2.017E+04	3.209E+07	1.923E+04	A	3.084
7		5000					
8							
9							
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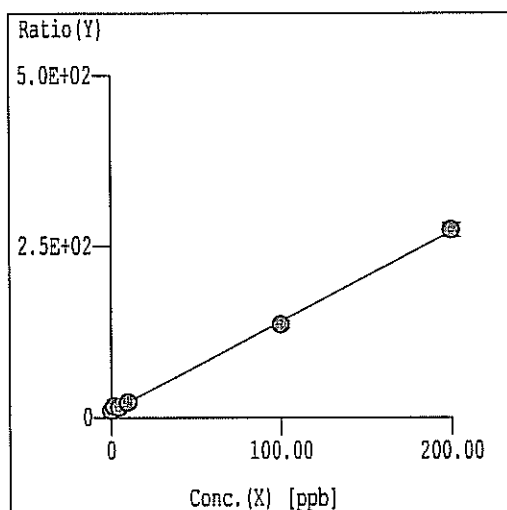
Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9997$   
 $Y = 9.533E-001 \cdot X + 3.361E+000$   
 $X = 1.049E+000 \cdot Y - 3.526E+000$   
DL = 1.873 ppb  
BEC = 3.526 ppb

Weight: OFF  
Min Conc: 0.000



=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 27 Al                72     ppb

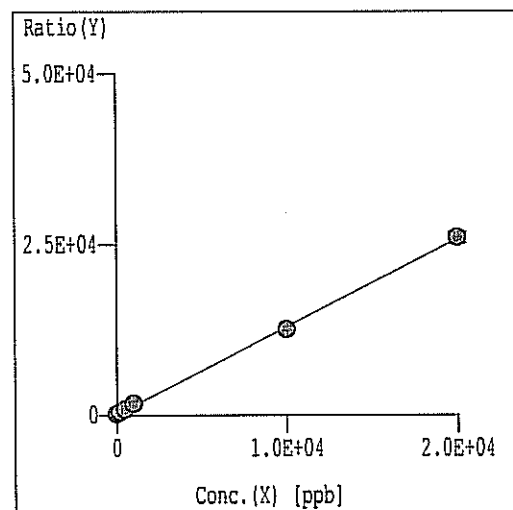


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.215E-01	1.727E+04	1.002E+01	P	15.37
2		2.000	5.248	2.863E+04	1.673E+01	P	30.70
3		5.000	3.907	2.593E+04	1.497E+01	P	16.96
4		10.00	9.526	4.035E+04	2.232E+01	P	11.79
5		100.0	96.36	2.362E+05	1.358E+02	P	3.769
6		200.0	201.8	4.567E+05	2.737E+02	P	3.731
7		50.00					
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Curve Fit:       $Y=aX+b$   
 $r = 0.9996$   
 $Y = 1.307E+000 \cdot X + 9.866E+000$   
 $X = 7.650E-001 \cdot Y - 7.548E+000$   
DL = 3.535 ppb  
BEC = 7.548 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 39 K                72     ppb



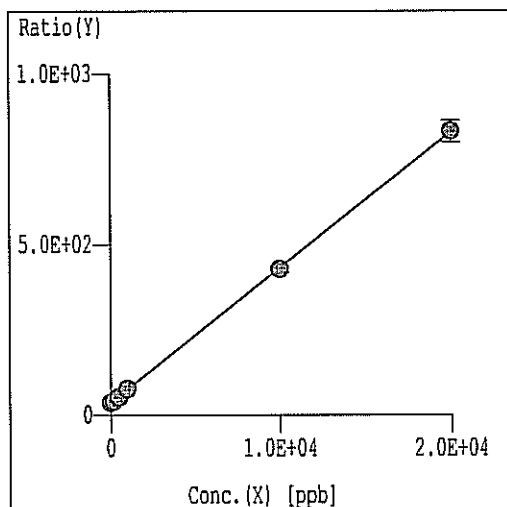
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	2.583E+05	1.496E+02	P	2.520
2		200.0	230.0	7.658E+05	4.449E+02	P	3.531
3		500.0	557.4	1.503E+06	8.653E+02	A	2.442
4		1000	1210	3.087E+06	1.704E+03	A	2.416
5		1.000E+04	9684	2.189E+07	1.258E+04	A	1.762
6		2.000E+04	2.015E+04	4.341E+07	2.602E+04	A	3.172
7		5000					
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20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9998$   
 $Y = 1.284E+000 \cdot X + 1.496E+002$   
 $X = 7.788E-001 \cdot Y - 1.165E+002$   
DL = 8.810 ppb  
BEC = 116.5 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 44 Ca                72     ppb

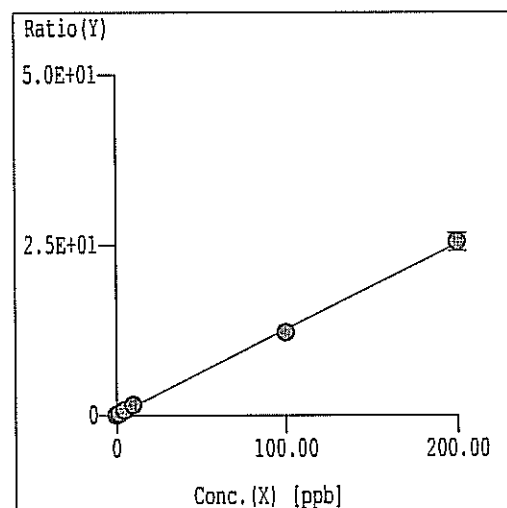


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	6.179E+04	3.579E+01	P	3.282
2		200.0	132.9	7.067E+04	4.106E+01	P	3.114
3		500.0	423.2	9.129E+04	5.258E+01	P	3.927
4		1000	1037	1.393E+05	7.693E+01	P	3.675
5		1.000E+04	9877	7.439E+05	4.277E+02	P	2.123
6		2.000E+04	2.006E+04	1.388E+06	8.318E+02	A	3.794
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 1.0000$   
 $Y = 3.968E-002 * X + 3.579E+001$   
 $X = 2.520E+001 * Y - 9.020E+002$   
DL = 88.80 ppb  
BEC = 902.0 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 47 Ti                72     ppb



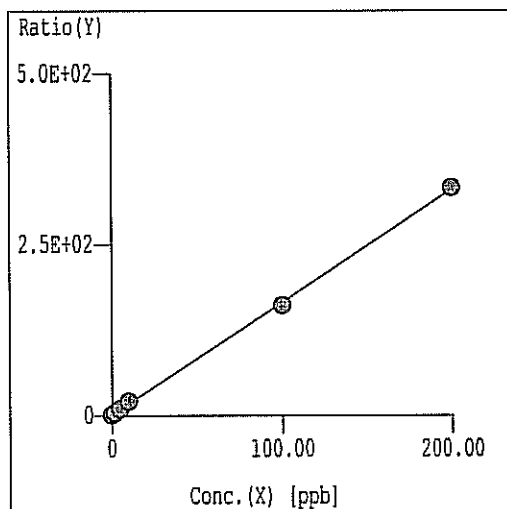
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	30.00	1.753E-02	P	68.08
2		2.000	1.933	450.0	2.612E-01	P	7.863
3		5.000	5.779	1296	7.460E-01	P	2.303
4		10.00	12.02	2778	1.533E+00	P	4.183
5		100.0	95.96	2.107E+04	1.211E+01	P	2.036
6		200.0	201.9	4.248E+04	2.547E+01	P	5.157
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9996$   
 $Y = 1.261E-001 * X + 1.753E-002$   
 $X = 7.933E+000 * Y - 1.390E-001$   
DL = 2.839E-01 ppb  
BEC = 1.390E-01 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 51 V                72    ppb

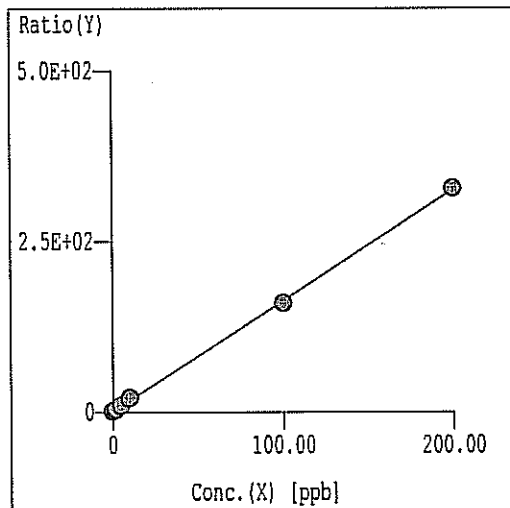


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	2.890E-01	255.6	4.255E-01	P	14.08
2		2.000	1.790	2344	3.851E+00	P	2.364
3		5.000	5.165	5781	9.411E+00	P	1.091
4		10.00	11.89	1.270E+04	2.049E+01	P	1.108
5		100.0	97.08	9.633E+04	1.609E+02	P	6.852E-01
6		200.0	201.4	1.951E+05	3.327E+02	P	6.628E-01
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9998$   
 $Y = 1.648E+000 \cdot X + 9.017E-001$   
 $X = 6.070E-001 \cdot Y - 5.473E-001$   
DL = 1.091E-01 ppb  
BEC = 5.473E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 52 Cr                72    ppb



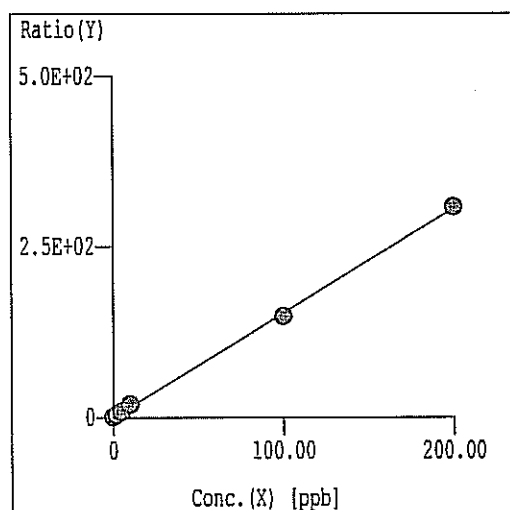
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	745.6	1.243E+00	P	5.170
2		2.000	1.865	2598	4.269E+00	P	2.521
3		5.000	5.342	6089	9.912E+00	P	1.799
4		10.00	12.25	1.309E+04	2.112E+01	P	4.324E-01
5		100.0	97.68	9.568E+04	1.598E+02	P	7.567E-02
6		200.0	201.0	1.921E+05	3.275E+02	P	1.511E-01
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9998$   
 $Y = 1.623E+000 \cdot X + 1.243E+000$   
 $X = 6.162E-001 \cdot Y - 7.657E-001$   
DL = 1.188E-01 ppb  
BEC = 7.657E-01 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 55 Mn                72    ppb

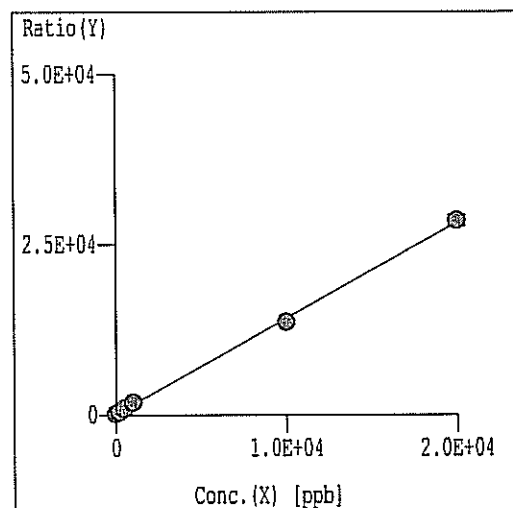


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	318.9	5.316E-01	P	3.122
2		2.000	2.147	2316	3.805E+00	P	4.193
3		5.000	5.343	5330	8.679E+00	P	2.718
4		10.00	12.27	1.192E+04	1.924E+01	P	1.025
5		100.0	96.68	8.859E+04	1.479E+02	P	6.031E-01
6		200.0	201.5	1.805E+05	3.078E+02	P	1.012
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9997$   
 $Y = 1.525E+000 \cdot X + 5.316E-001$   
 $X = 6.559E-001 \cdot Y - 3.486E-001$   
DL = 3.266E-02 ppb  
BEC = 3.486E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 56 Fe                72    ppb



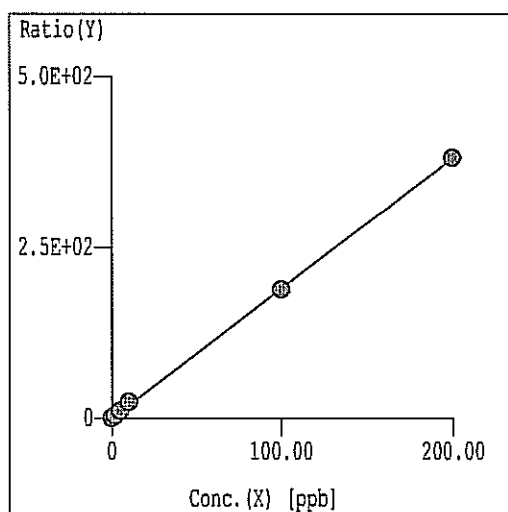
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	3.116E+05	1.804E+02	P	1.853
2		200.0	210.9	8.193E+05	4.759E+02	A	2.406
3		500.0	557.4	1.670E+06	9.615E+02	A	2.312
4		1000	1202	3.379E+06	1.865E+03	A	2.982
5		1.000E+04	9599	2.371E+07	1.363E+04	A	2.082
6		2.000E+04	2.019E+04	4.751E+07	2.847E+04	A	2.806
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9996$   
 $Y = 1.401E+000 \cdot X + 1.804E+002$   
 $X = 7.136E-001 \cdot Y - 1.288E+002$   
DL = 7.158 ppb  
BEC = 128.8 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 59 Co                72    ppb

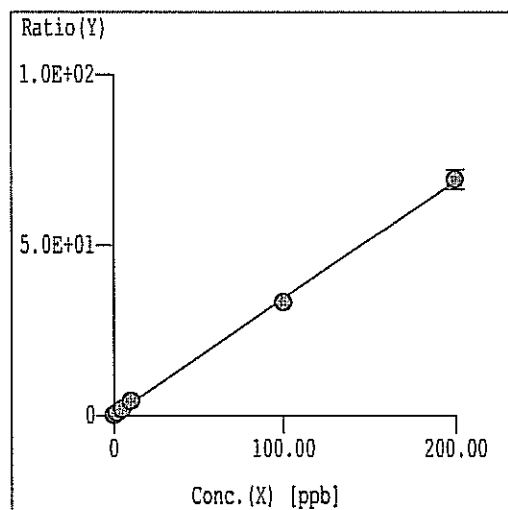


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	21.11	3.513E-02	P	22.56
2		2.000	2.152	2512	4.127E+00	P	1.821
3		5.000	5.729	6715	1.093E+01	P	1.888
4		10.00	12.50	1.475E+04	2.380E+01	P	8.308E-01
5		100.0	99.10	1.129E+05	1.885E+02	P	1.910
6		200.0	200.3	2.235E+05	3.810E+02	P	3.599E-01
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9999$   
 $Y = 1.902E+000 \cdot X + 3.513E-002$   
 $X = 5.258E-001 \cdot Y - 1.847E-002$   
DL = 1.250E-02 ppb  
BEC = 1.847E-02 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 60 Ni                72    ppb



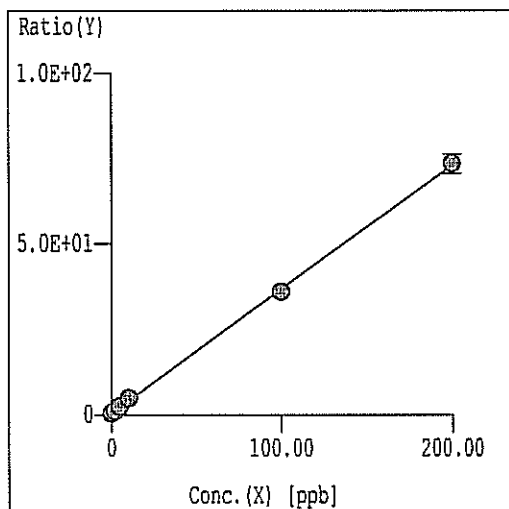
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	-2.013E-01	186.7	1.079E-01	P	28.73
2		2.000	1.936	1449	8.411E-01	P	1.566
3		5.000	5.113	3349	1.931E+00	P	8.458
4		10.00	12.02	7787	4.301E+00	P	6.378
5		100.0	96.47	5.787E+04	3.327E+01	P	5.509E-01
6		200.0	201.7	1.157E+05	6.935E+01	P	4.185
7		50.00					
8							
9							
10							
11							
12							
13							
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17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9997$   
 $Y = 3.430E-001 \cdot X + 1.770E-001$   
 $X = 2.915E+000 \cdot Y - 5.159E-001$   
DL = 2.712E-01 ppb  
BEC = 5.159E-01 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 65 Cu                72    ppb

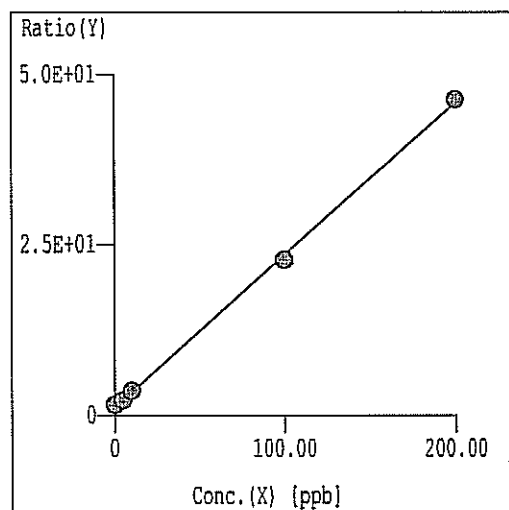


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	4.167E-01	628.9	3.642E-01	P	2.702
2		2.000	1.634	1906	1.108E+00	P	7.949
3		5.000	5.272	4216	2.428E+00	P	4.256
4		10.00	11.85	8719	4.813E+00	P	3.127
5		100.0	97.52	6.244E+04	3.590E+01	P	2.148
6		200.0	201.1	1.226E+05	7.349E+01	P	3.899
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9998$   
 $Y = 3.628E-001 * X + 5.154E-001$   
 $X = 2.756E+000 * Y - 1.420E+000$   
DL = 8.137E-02 ppb  
BEC = 1.420 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 66 Zn                72    ppb



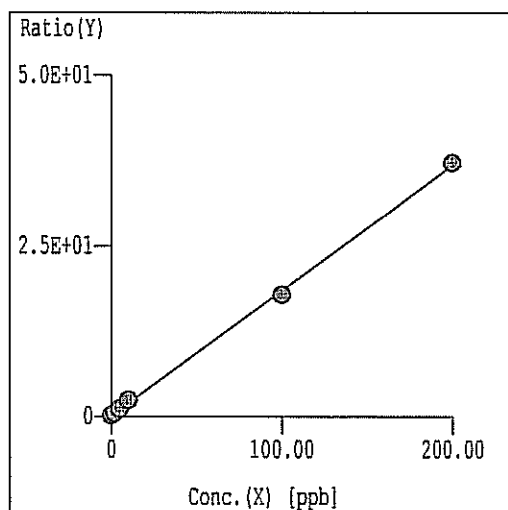
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.456	904.5	1.509E+00	P	7.131
2	ON	2.000		957.8	1.574E+00	P	2.604
3		5.000	4.531	1349	2.197E+00	P	6.653
4		10.00	10.82	2232	3.603E+00	P	2.296
5		100.0	96.44	1.362E+04	2.275E+01	P	2.223
6		200.0	201.7	2.715E+04	4.629E+01	P	5.713E-02
7							
8							
9							
10							
11							
12							
13							
14							
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17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9997$   
 $Y = 2.236E-001 * X + 1.184E+000$   
 $X = 4.473E+000 * Y - 5.294E+000$   
DL = 1.444 ppb  
BEC = 5.294 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 75 As                72    ppb

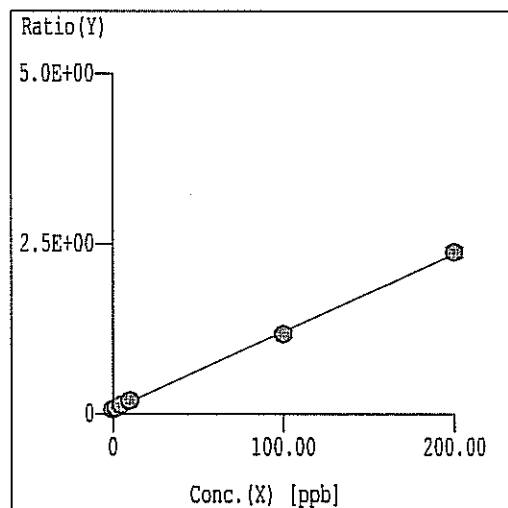


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	78.15	1.304E-01	P	7.842
2		2.000	2.037	307.0	5.046E-01	P	2.855
3		5.000	5.451	694.5	1.132E+00	P	8.675
4		10.00	12.40	1492	2.408E+00	P	2.157
5		100.0	96.52	1.070E+04	1.786E+01	P	9.924E-01
6		200.0	201.6	2.180E+04	3.716E+01	P	1.258
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9997$   
 $Y = 1.837E-001 * X + 1.304E-001$   
 $X = 5.444E+000 * Y - 7.101E-001$   
DL = 1.671E-01 ppb  
BEC = 7.101E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 82 Se                72    ppb



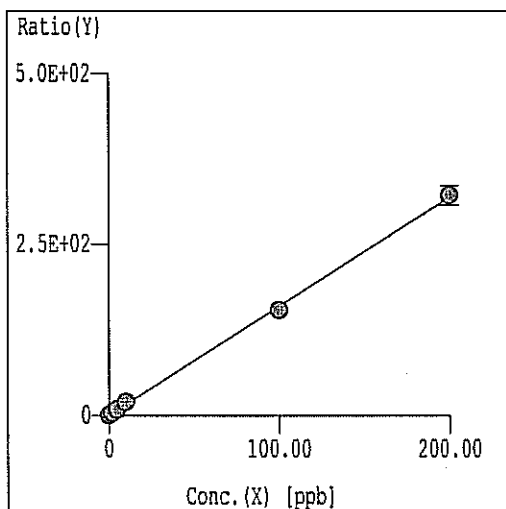
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	-7.402E-02	111.9	6.477E-02	P	10.66
2		2.000	1.915	150.7	8.758E-02	P	6.940
3		5.000	5.845	230.7	1.326E-01	P	7.335
4		10.00	11.22	351.5	1.942E-01	P	9.492
5		100.0	96.36	2036	1.170E+00	P	4.492
6		200.0	201.7	3969	2.378E+00	P	3.411
7		50.00					
8							
9							
10							
11							
12							
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14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9997$   
 $Y = 1.146E-002 * X + 6.562E-002$   
 $X = 8.723E+001 * Y - 5.724E+000$   
DL = 1.806 ppb  
BEC = 5.724 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 88 Sr                72      ppb

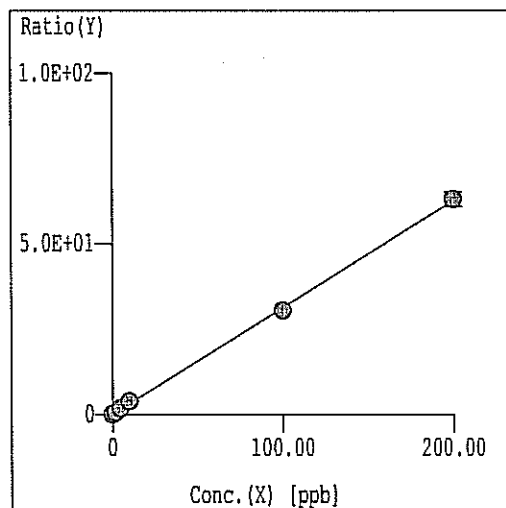


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	210.0	1.218E-01	P	20.00
2		2.000	2.165	6151	3.576E+00	P	5.771
3		5.000	5.470	1.536E+04	8.848E+00	P	4.333
4		10.00	12.18	3.541E+04	1.955E+01	P	4.072
5		100.0	96.28	2.674E+05	1.537E+02	P	2.156
6		200.0	201.7	5.371E+05	3.219E+02	P	4.467
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9997$   
 $Y = 1.595E+000 \cdot X + 1.218E-001$   
 $X = 6.269E-001 \cdot Y - 7.635E-002$   
 $DL = 4.582E-02 \text{ ppb}$   
 $BEC = 7.635E-02 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 95 Mo                72      ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	27.78	1.618E-02	P	41.00
2		2.000	1.991	1100	6.390E-01	P	2.131
3		5.000	5.738	3144	1.811E+00	P	3.850
4		10.00	12.13	6904	3.810E+00	P	1.481
5		100.0	96.94	5.277E+04	3.033E+01	P	1.297
6		200.0	201.4	1.051E+05	6.301E+01	P	3.414
7		50.00					
8							
9							
10							
11							
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19							
20							

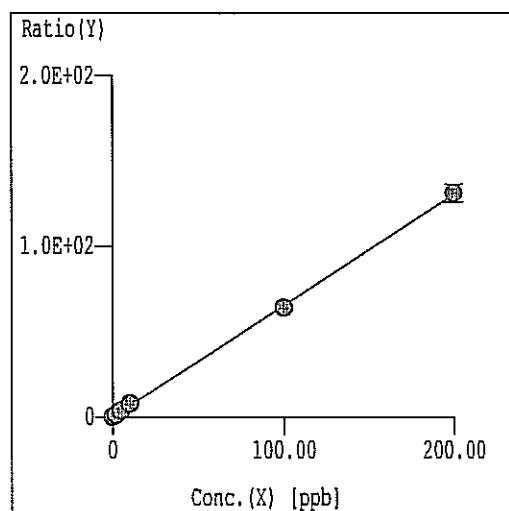
Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9998$   
 $Y = 3.127E-001 \cdot X + 1.618E-002$   
 $X = 3.197E+000 \cdot Y - 5.174E-002$   
 $DL = 6.365E-02 \text{ ppb}$   
 $BEC = 5.174E-02 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000



=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 109 Ag                72    ppb

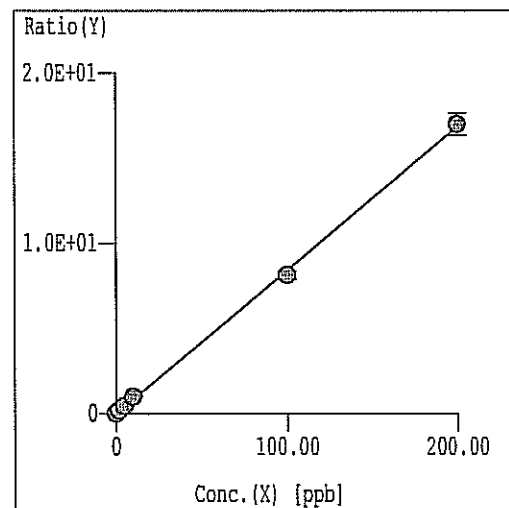


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	-4.850E-01	76.67	4.434E-02	P	16.44
2		2.000	1.670	2489	1.446E+00	P	4.674
3		5.000	5.311	6619	3.815E+00	P	7.245
4		10.00	11.71	1.445E+04	7.979E+00	P	4.698
5		100.0	97.76	1.112E+05	6.395E+01	P	2.829
6		200.0	201.0	2.188E+05	1.311E+02	P	3.989
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9999$   
 $Y = 6.505E-001 * X + 3.598E-001$   
 $X = 1.537E+000 * Y - 5.532E-001$   
DL = 3.361E-02 ppb  
BEC = 5.532E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 111 Cd                115    ppb



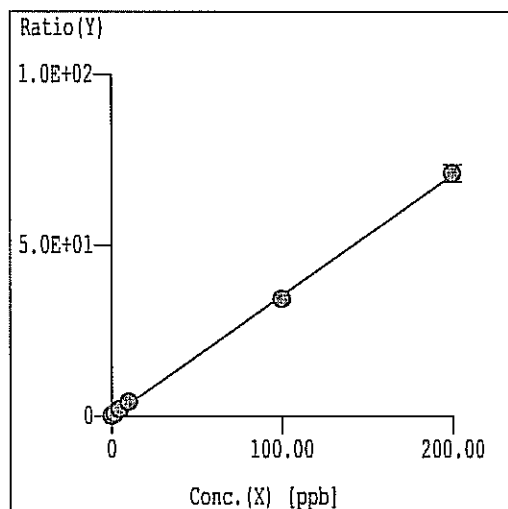
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	4.815	1.695E-03	P	28.29
2		2.000	2.274	545.2	1.934E-01	P	5.412
3		5.000	5.453	1325	4.613E-01	P	3.492
4		10.00	11.73	2967	9.905E-01	P	3.529
5		100.0	96.49	2.309E+04	8.134E+00	P	2.994
6		200.0	201.7	4.584E+04	1.700E+01	P	3.851
7		50.00					
8							
9							
10							
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12							
13							
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17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9997$   
 $Y = 8.428E-002 * X + 1.695E-003$   
 $X = 1.187E+001 * Y - 2.012E-002$   
DL = 1.707E-02 ppb  
BEC = 2.012E-02 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 118 Sn                72    ppb

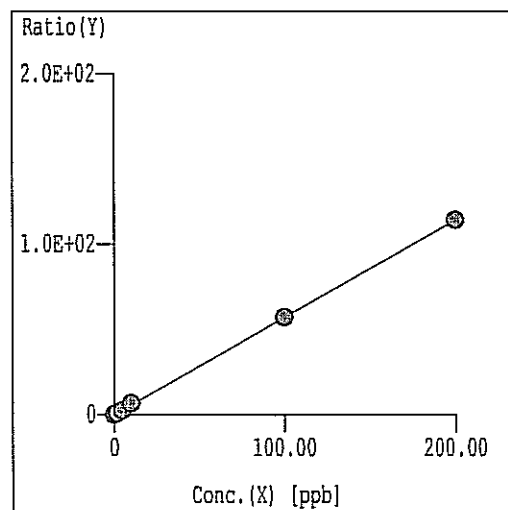


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	43.33	2.511E-02	P	9.313
2		2.000	2.133	1339	7.779E-01	P	3.771
3		5.000	5.670	3517	2.026E+00	P	5.963
4		10.00	11.74	7548	4.168E+00	P	5.025
5		100.0	97.05	5.963E+04	3.428E+01	P	3.019
6		200.0	201.4	1.186E+05	7.111E+01	P	3.521
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9998$   
 $Y = 3.530E-001*X + 2.511E-002$   
 $X = 2.833E+000*Y - 7.115E-002$   
DL = 1.988E-02 ppb  
BEC = 7.115E-02 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 121 Sb                72    ppb



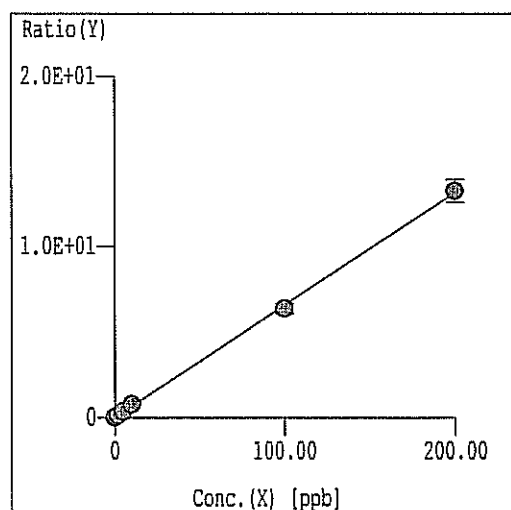
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	20.37	3.388E-02	P	23.88
2		2.000	1.418	513.3	8.435E-01	P	5.722
3		5.000	4.527	1609	2.619E+00	P	2.410
4		10.00	11.69	4158	6.709E+00	P	8.554E-01
5		100.0	99.90	3.419E+04	5.709E+01	P	9.057E-01
6		200.0	200.0	6.702E+04	1.143E+02	P	9.792E-01
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9999$   
 $Y = 5.711E-001*X + 3.388E-002$   
 $X = 1.751E+000*Y - 5.932E-002$   
DL = 4.249E-02 ppb  
BEC = 5.932E-02 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 135 Ba                115    ppb

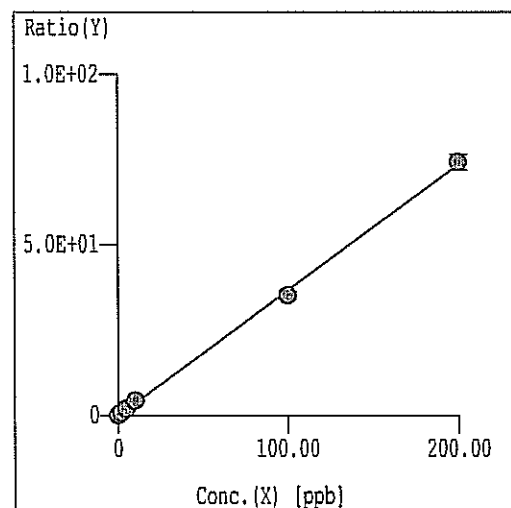


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	-1.145E-01	18.89	6.863E-03	P	42.09
2		2.000	2.087	426.7	1.514E-01	P	12.56
3		5.000	5.154	1013	3.529E-01	P	6.662
4		10.00	11.60	2327	7.768E-01	P	3.642
5		100.0	96.71	1.808E+04	6.370E+00	P	4.688
6		200.0	201.6	3.575E+04	1.326E+01	P	5.034
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9998$   
 $Y = 6.572E-002 \cdot X + 1.419E-002$   
 $X = 1.522E+001 \cdot Y - 2.159E-001$   
DL = 1.280E-01 ppb  
BEC = 2.159E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 203 Tl                209    ppb



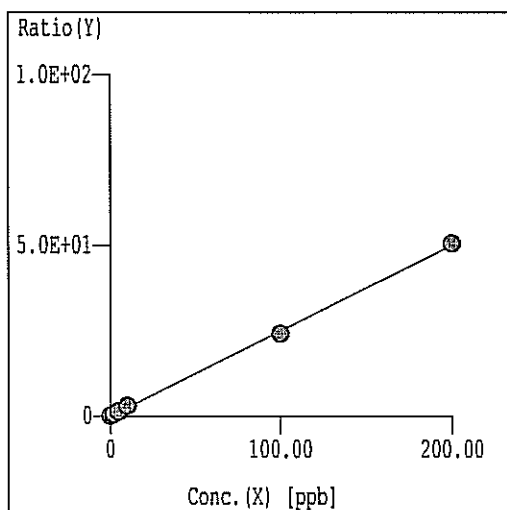
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	34.45	2.144E-02	P	41.97
2		2.000	2.150	1286	8.099E-01	P	8.773
3		5.000	5.338	3187	1.979E+00	P	2.637
4		10.00	11.80	7319	4.347E+00	P	5.584
5		100.0	95.73	5.459E+04	3.513E+01	P	2.993
6		200.0	202.0	1.087E+05	7.412E+01	P	3.090
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9996$   
 $Y = 3.668E-001 \cdot X + 2.144E-002$   
 $X = 2.727E+000 \cdot Y - 5.847E-002$   
DL = 7.362E-02 ppb  
BEC = 5.847E-02 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 207 Pb            209    ppb



	Rjct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	56.67	3.529E-02	P	42.95
2		2.000	2.174	921.2	5.803E-01	P	6.509
3		5.000	5.481	2269	1.409E+00	P	3.357
4		10.00	11.84	5058	3.004E+00	P	4.170
5		100.0	96.44	3.763E+04	2.421E+01	P	2.456
6		200.0	201.7	7.419E+04	5.060E+01	P	1.743
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9997$   
 $Y = 2.507E-001 \cdot X + 3.529E-002$   
 $X = 3.989E+000 \cdot Y - 1.408E-001$   
DL = 1.814E-01 ppb  
BEC = 1.408E-01 ppb

Weight: OFF  
Min Conc: 0.000

Last Calib: Feb 28, 2008 03:56 pm  
 Calibration Type: External Calibration Method  
 Calibration Title: ICP\_OR5  
 Weighting Method: 1/(SD\*SD)  
 Mass Interpolation Fit for VIS: Point to Point  
 Method: C:\ICPCHEM\1\METHODS\ICP\_LI.M  
 Multi Tune: #1 022708a1.u  
 #2 051107he.u

=== Standard Files ===

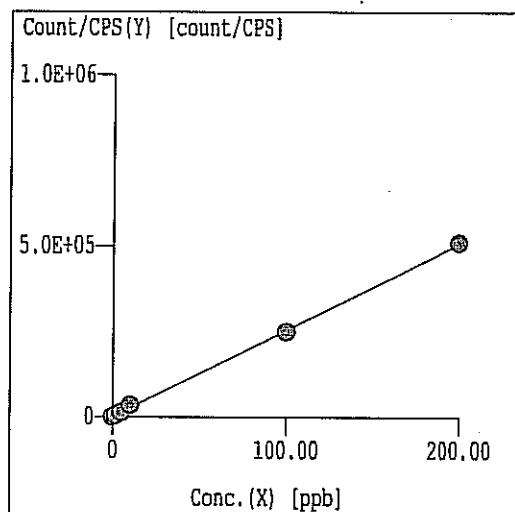
<Data Correction>

Bkg File: —  
 Rejected Masses: —  
 Interference Correction: OFF

	Data File	Sample Name	Date Acquired
1	c:\icpchem\1\data\08b27m00.b\002calb.d	CAL BLK	Feb 27 2008 12:09 pm
2	c:\icpchem\1\data\08b27m00.b\003cals.d	2/10/200	Feb 27 2008 12:12 pm
3	c:\icpchem\1\data\08b27m00.b\004cals.d	5/25/500	Feb 27 2008 12:16 pm
4	c:\icpchem\1\data\08b27m00.b\005cals.d	10/50/1000	Feb 27 2008 12:19 pm
5	c:\icpchem\1\data\08b27m00.b\006cals.d	100/500/10K	Feb 27 2008 12:22 pm
6	c:\icpchem\1\data\08b27m00.b\007cals.d	200/1000/20K	Feb 27 2008 12:26 pm
7	—		
8	—		
9	—		
10	—		
11	---		
12	---		
13	---		
14	—		
15	—		
16	—		
17	—		
18	—		
19	—		
20	—		

## === Graph Detail ===

Step Mass Element      ISTD      Unit  
 (1) 7 Li                      —      ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-6.876E-01	117.8		P 7.122
2		2.000	1.407	5415		P 2.586
3		5.000	4.661	1.364E+04		P 1.798
4		10.00	12.84	3.434E+04		P 2.868E-01
5		100.0	97.81	2.492E+05		P 1.395
6		200.0	201.0	5.101E+05		P 5.519E-01
7						
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:       $Y=aX+b$   
 $r = 0.9998$   
 $Y = 2.529E+003 \cdot X + 1.857E+003$   
 $X = 3.954E-004 \cdot Y - 7.342E-001$   
 DL = 9.951E-03 ppb  
 BEC = 7.342E-01 ppb

Weight: OFF  
 Min Conc: 0.000

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc. Contract: \_\_\_\_\_  
 Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.: \_\_\_\_\_ SDG No.: 0802318  
 Initial Calibration Source: \_\_\_\_\_ Run: MERCURY 080225A  
 Continuing Calibration Source: \_\_\_\_\_ Start: 2/25/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Mercury	5.0	4.94	98.8	5.0	4.83	96.6	4.88	97.6	AV

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802318

Initial Calibration Source:

Run: MERCURY 080225A

Continuing Calibration Source:

Start: 2/25/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Mercury	5.0	4.94	98.8	5.0	4.87	97.4			AV

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN



3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802318

Preparation Blank Matrix (soil/water): SOIL

Run: MERCURY 080225A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
	C		1	C	2	C	3	C	C		
Mercury	0.0		-0.1		-0.1		-0.1		0.000		AV

Note: MDLs are used, not IDLs

FORM III - IN

# CETAC Hg Analysis Report

Analyst: instrument

Worksheet file: C:\Program Files\QuickTrace\Worksheets\022508AS.wsz

Date Started: 2/25/2008 12:52:07 PM

Comment:

ICA1 STD# 731-584-60.11  
MS/LCS STD# 731-584-60.12  
JC. 2/25/08

## Results

Sample Name	Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
Calibration Blank	STD	02/25/08 02:37:19 pm	0.000	61	7.70
Replicates			66.2 62.5 57.4 56.1		
Standard #1	STD	02/25/08 02:39:18 pm	0.200	819	1.10
Replicates			805.8 820.1 823.0 826.2		
Standard #2	STD	02/25/08 02:41:18 pm	1.000	3799	0.69
Replicates			3774.5 3782.8 3805.1 3832.9		
Standard #3	STD	02/25/08 02:43:18 pm	2.000	7621	0.99
Replicates			7537.2 7584.9 7654.9 7708.9		
Standard #4	STD	02/25/08 02:45:20 pm	5.000	18731	0.42
Replicates			18635.1 18707.5 18762.4 18818.2		
Standard #5	STD	02/25/08 02:47:24 pm	10.000	36046	0.66
Replicates			35809.0 35910.0 36119.6 36345.4		

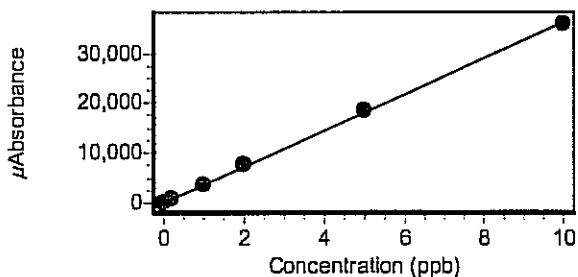
### Calibration

Equation:  $A = 240.998 + 3606.070C$

R2: 0.99963

SEE: 300.1214

Flags:



ICV-584-60-13	ICV	02/25/08 02:52:23 pm	4.940	18040	0.32
Replicates			17956.2 18048.9 18064.2 18090.4		
% Recovery			98.72		
ICB	ICB	02/25/08 02:54:25 pm	-0.048	69	23.75
Replicates			87.3 73.7 65.2 48.4		

Sample Name					Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
CRA-584-60-11					CRDL	02/25/08 02:56:26 pm	0.158	810	0.77
Replicates	801.6	810.8	816.6	811.5					
% Recovery	78.91								
GBLKS1-022508					MB	02/25/08 02:58:24 pm	-0.041	92	4.42
Replicates	96.8	90.8	92.0	87.0					
GLCSS1-022508-584-60-12					LCS	02/25/08 03:00:26 pm	5.210	19047	0.55
Replicates	18914.4	19015.4	19099.5	19156.9					
% Recovery	104.30								
GLCSDS1-022508-584-60-12					LCS	02/25/08 03:02:28 pm	5.170	18879	0.56
Replicates	18737.8	18857.1	18951.0	18968.4					
% Recovery	103.37								
0802300-01C					UNK	02/25/08 03:12:09 pm	0.142	752	0.40
Replicates	748.3	753.5	752.2	755.5					
0802300-01CDUP					DUP	02/25/08 03:14:09 pm	0.143	756	0.80
Replicates	748.1	761.4	760.5	755.7					
		RPD 0.00							
0802300-01CMS-584-60-12					MSK	02/25/08 03:16:10 pm	4.990	18223	0.62
Replicates	18072.7	18201.7	18308.4	18309.3					
% Recovery	96.87								
0802300-01CMSD-584-60-12					MSDUP	02/25/08 03:18:14 pm	5.060	18479	0.25
Replicates	18410.6	18487.0	18506.7	18511.2					
% Recovery	98.29	RPD 1.41							
CCV-584-60-13					CCV	02/25/08 03:20:16 pm	4.830	17656	1.05
Replicates	17451.8	17562.3	17744.5	17866.4					
% Recovery	96.59								
CCB					CCB	02/25/08 03:22:19 pm	-0.058	32	16.32
Replicates	39.6	31.5	29.9	27.5					
0802300-02D					UNK	02/25/08 03:29:21 pm	-0.022	161	1.78
Replicates	159.2	157.5	163.9	162.1					
0802300-03C					UNK	02/25/08 03:31:21 pm	-0.035	115	2.04
Replicates	112.1	116.4	116.1	117.4					

Sample Name					Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
0802300-04C					UNK	02/25/08 03:33:20 pm	0.080	529	0.45
Replicates	528.2	526.1	529.8	531.7					
0802300-05D					UNK	02/25/08 03:35:20 pm	-0.039	99	2.25
Replicates	97.6	97.9	98.3	102.3					
0802300-06C					UNK	02/25/08 03:37:21 pm	-0.034	118	3.59
Replicates	111.9	121.6	117.9	120.1					
0802300-07D					UNK	02/25/08 03:39:21 pm	-0.025	150	2.97
Replicates	143.9	151.7	154.3	151.6					
0802300-08D					UNK	02/25/08 03:41:23 pm	-0.025	150	3.00
Replicates	144.9	147.9	152.4	155.0					
0802304-01D					UNK	02/25/08 03:43:24 pm	-0.015	188	3.14
Replicates	183.7	191.1	195.1	182.8					
0802304-02D					UNK	02/25/08 03:45:26 pm	0.003	253	1.51
Replicates	247.5	253.8	256.7	252.6					
0802304-03D					UNK	02/25/08 03:47:29 pm	0.014	291	2.49
Replicates	280.1	295.5	292.3	295.1					
CCV-584-60-13					CCV	02/25/08 03:49:31 pm	4.880	17850	0.76
Replicates	17656.9	17852.2	17935.0	17956.0					
% Recovery	97.66								
CCB					CCB	02/25/08 03:53:52 pm	-0.058	33	18.54
Replicates	38.6	27.7	27.3	37.3					
0802318-01C					UNK	02/25/08 03:55:51 pm	0.151	785	0.46
Replicates	781.0	782.9	786.5	789.2					
0802318-02D					UNK	02/25/08 03:57:50 pm	-0.032	124	3.00
Replicates	129.5	123.0	121.5	122.0					

Sample Name					Type	Date/Time	Conc (ppb)	μAbs	%RSD
0802318-03C					UNK	02/25/08 03:59:51 pm	-0.002	232	1.29
Replicates	234.2	234.8	231.5	228.2					
0802318-04C					UNK	02/25/08 04:01:50 pm	-0.015	188	2.01
Replicates	189.0	191.5	183.0	190.4					
CCV-584-60-13					CCV	02/25/08 04:03:52 pm	4.870	17809	0.60
Replicates	17702.2	17753.5	17833.8	17948.2					
% Recovery	97.44								
CCB					CCB	02/25/08 04:05:56 pm	-0.060	23	26.59
Replicates	31.5	20.0	17.7	21.9					
GBLKS2-022508					MB	02/25/08 04:13:57 pm	-0.052	55	10.57
Replicates	48.3	52.7	54.8	62.1					
GLCSS2-022508-584-60-12					LCS	02/25/08 04:15:58 pm	5.120	18707	0.58
Replicates	18550.5	18719.3	18791.5	18768.6					
% Recovery	102.42								
GLCSDS2-022508-584-60-12					LCS	02/25/08 04:18:04 pm	5.240	19127	0.25
Replicates	19063.9	19124.4	19144.6	19176.9					
% Recovery	104.75								
0802326-06C					UNK	02/25/08 04:20:07 pm	-0.047	73	7.40
Replicates	77.3	74.0	75.7	65.2					
0802326-06CDUP					DUP	02/25/08 04:22:11 pm	-0.049	66	5.61
Replicates	67.9	64.9	69.1	60.8					
	RPD 0.00								
0802326-06CMS-584-60-12					MSK	02/25/08 04:24:13 pm	4.690	17147	0.17
Replicates	17104.8	17163.7	17165.8	17154.7					
% Recovery	94.74								
0802326-06CMSD-584-60-12					MSDUP	02/25/08 04:26:15 pm	4.800	17548	0.48
Replicates	17440.4	17529.4	17587.3	17636.7					
% Recovery	96.96	RPD 2.35							
0802326-01B					UNK	02/25/08 04:28:17 pm	0.118	667	0.45
Replicates	667.8	663.1	669.6	669.3					

Sample Name					Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
0802326-02B					UNK	02/25/08 04:30:19 pm	-0.015	187	2.57
Replicates	183.3	185.8	184.5	193.9					
0802326-03C					UNK	02/25/08 04:32:19 pm	-0.034	119	0.96
Replicates	117.7	118.7	119.7	120.2					
CCV-584-60-13					CCV	02/25/08 04:34:20 pm	4.910	17960	0.73
Replicates	17807.5	17901.0	18030.0	18101.9					
% Recovery	98.27								
CCB					CCB	02/25/08 04:36:25 pm	-0.056	39	12.33
Replicates	43.6	35.4	34.3	42.7					
0802326-04C					UNK	02/25/08 04:38:27 pm	0.011	281	2.11
Replicates	282.9	288.1	275.8	276.1					
0802326-05C					UNK	02/25/08 04:40:30 pm	0.054	436	0.88
Replicates	434.1	436.1	432.7	441.4					
0802326-07C					UNK	02/25/08 04:42:32 pm	0.033	360	0.81
Replicates	360.8	362.9	358.3	356.2					
0802326-08B					UNK	02/25/08 04:44:34 pm	0.030	348	0.67
Replicates	346.2	351.4	346.7	348.4					
0802326-09B					UNK	02/25/08 04:46:37 pm	-0.035	117	1.96
Replicates	118.4	115.3	118.5	113.9					
0802326-10C					UNK	02/25/08 04:48:41 pm	-0.036	110	3.47
Replicates	112.3	112.4	110.3	104.3					
CCV-584-60-13					CCV	02/25/08 04:50:42 pm	4.960	18111	0.23
Replicates	18050.6	18134.2	18139.1	18118.3					
% Recovery	99.11								
CCB					CCB	02/25/08 04:52:46 pm	-0.065	6	43.53
Replicates	5.1	8.1	7.0	2.5					

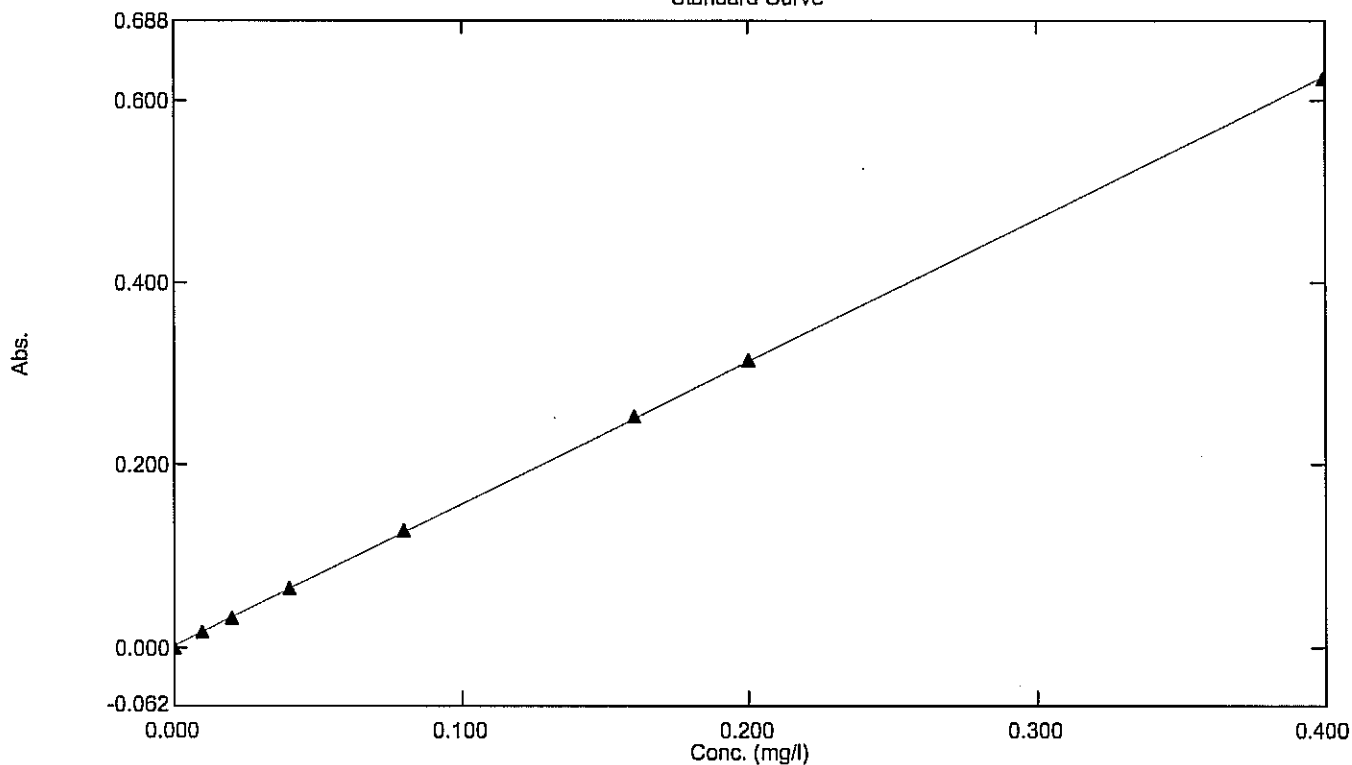
# Standard Table Report

02/28/2008 04:03:18 PM

File Name: C:\Program

Files\Shimadzu\UVProbe\Data\CALIBRATION\Cyanide\120707\_CN\_TW\_TS\_CAL.p

Standard Curve



Standard Table

	Sample ID	Type	Ex	Conc	WL578.0	Wgt.Factor	Comments
1	STD1	Standard		0.000	0.000	1.000	
2	STD2	Standard		0.010	0.016	1.000	
3	STD3	Standard		0.020	0.032	1.000	
4	STD4	Standard		0.040	0.065	1.000	
5	STD5	Standard		0.080	0.128	1.000	
6	STD6	Standard		0.160	0.253	1.000	
7	STD7	Standard		0.200	0.316	1.000	
8	STD8	Standard		0.400	0.625	1.000	
9							

Total Cyanide by SW 9014 Prep by SW9010		SOPs: WC-020		578 nm	Analyst: RPM	Date/Time: 02-22-08 1200		
Water or Soil WO # / SX #	Init Sx Wt or Vol (g / mL)	Final Prep Vol. (mL)	Prep Dil factor	Final Dil factor	Abs.	Init Conc mg/L	Final Conc. mg/L / mg/Kg	Comments
WBLK 51	1g	50	50X		0.001	-0.00	-0.000	PG0205
WLS 51					0.305	0.194	0.194 9.7	
0802 304-01					0.005	0.002	0.00	
DWP -01					0.005	0.002	0.00	
MS -01					0.289	0.184	9.2	
↓ -02					0.005	0.002	0.00	
↓ -03					0.004	0.002	0.00	
0802 318-01					0.003	0.001	0.00	
↓ -02					0.002	0.00	0.00	
↓ -03					0.005	0.002	0.00	
↓ -04					0.005	0.002	0.00	
0802 380-01					0.001	-0.00	0.00	
↓ -02					0.004	0.001	0.00	
↓ -03					0.005	0.002	0.00	
↓ -04					0.006	0.002	0.00	
↓ -05					0.003	0.001	0.00	
↓ -06					0.006	0.003	0.00	
↓ -07					0.006	0.002	0.00	
↓ -08					0.006	0.002	0.00	
CCV	50				0.321	0.002	0.004	
CCS	↓				-0.000		-0.002	
LCS / ICV ID #: 573-80-1	CN Color reagent ID: 573-98-4		MgCl <sub>2</sub> (2.5M) ID: 573-27-01		Reviewed By: 7f 2/25/08			
CCV ID 573-80-7	Chloramine-T ID: 1-746-9-04		NaHPO <sub>4</sub> · H <sub>2</sub> O ID: 5 1-746-8-2					

11/30/2018

021974

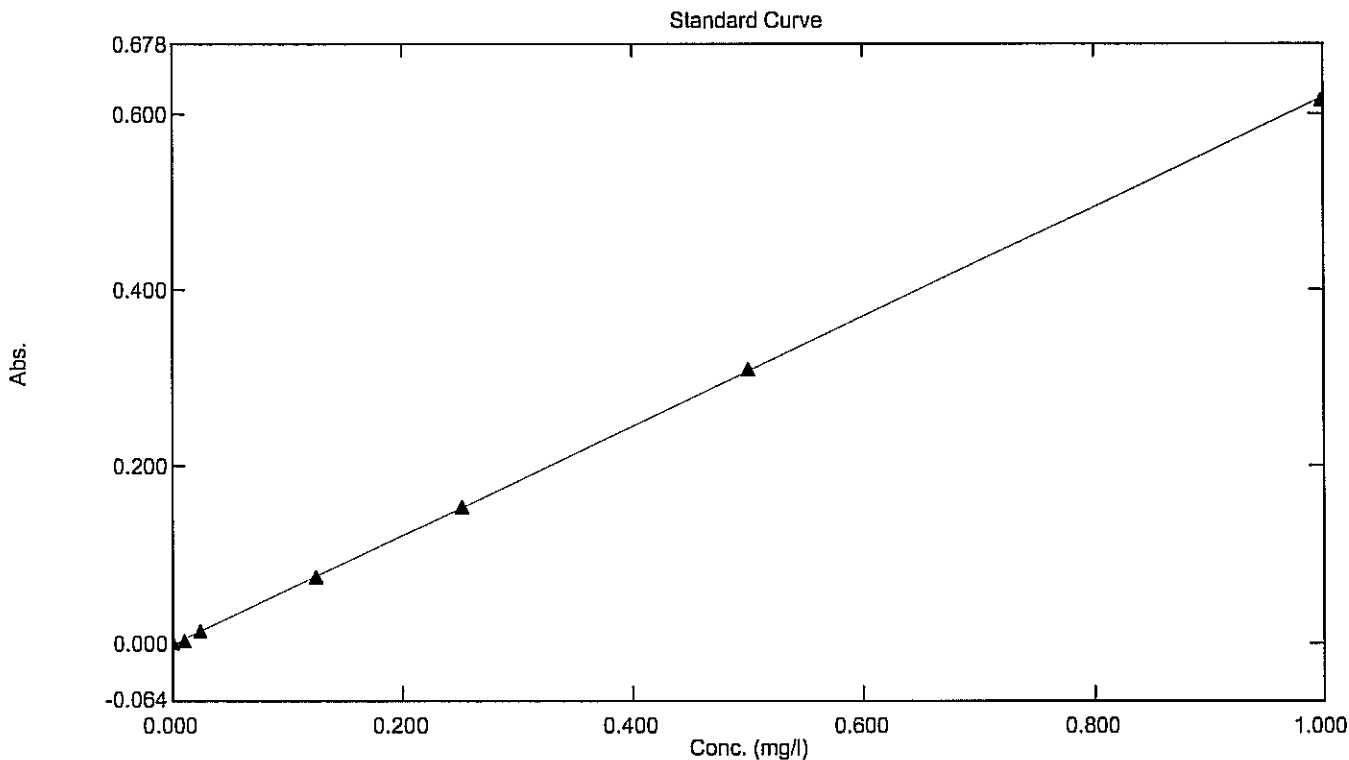


# Standard Table Report

02/28/2008 09:03:53 AM

File Name: C:\Program

Files\Shimadzu\UVProbe\Data\CALIBRATION\PO4\TP-OPO4-CAL-052207.pho



Multiple Correlation Coefficient  $r^2 = 0.99995$

Standard Table

	Sample ID	Type	Ex	Conc	WL880.0	Wgt.Factor	Comments
1	STD1	Standard		0.000	-0.001	1.000	
2	STD2	Standard		0.010	0.002	1.000	
3	STD3	Standard		0.025	0.013	1.000	
4	STD4	Standard		0.125	0.074	1.000	
5	STD5	Standard		0.250	0.154	1.000	
6	STD6	Standard		0.500	0.309	1.000	
7	STD7	Standard		1.000	0.616	1.000	
8							

## Phosphorus Analysis

## ALS Laboratory Group

Analyst: J.M.

Date/Time: 02/20/08 10:00

SOP #:

Method: P-TS

WO # / SX #	Init Sample Vol (mL) or Wt (grams)	Prep Final Volume (mL)	Anal Dil Factor	Total Dil Factor	Background (A)	Colored Sample (B)	Corr. Abs (B-A)	Corrected Conc. - mg/L (B-A) <sup>100</sup>	Comments / Batch ID
W1644 w1	Apr	50 ml		50X	Abs.	Conc. mg/L		0.003	P-60110
W1644 w1				50X				0.159	02-21-13
0802300-01C			5X	250X				0.217	88.75
0802300-01C			5X	250X				0.213	86.75
0802300-01C			5X	250X				0.281	114.50
0802300-02C				50X				0.212	17.25
0802300-03C			5X	250X				0.122	50
0802300-04C			5X	250X				0.314	127.75
0802300-05C				50X				0.239	19.45
0802300-06C				50X				0.508	41.2
0802300-07C			5X	250X				0.141	59
0802300-08C			5X	250X				0.390	158.50
0802300-09C			5X	250X				0.151	62
0802300-10C				50X				0.238	19.4
0802300-11C								0.335	0.544
0802300-12C								0.001	0.006
0802300-13C			5X	250X				0.156	64
0802300-14C			5X	250X				0.238	96.75
0802300-15C				50X				0.173	14.15
0802300-16C				50X				0.462	37.5
0802300-17C				50X				0.209	17.1
0802300-18C				50X					
0802300-19C				50X					
0802300-20C				50X					
0802300-21C				50X					
0802300-22C				50X					
0802300-23C				50X					
0802300-24C				50X					
0802300-25C				50X					
0802300-26C				50X					
0802300-27C				50X					
0802300-28C				50X					
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0802300-30C				50X					
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0802300-90C				50X					
0802300-91C				50X					
0802300-92C				50X					
0802300-93C				50X					
0802300-94C				50X					
0802300-95C				50X					
0802300-96C				50X					
0802300-97C				50X					
0802300-98C				50X					
0802300-99C				50X					
0802300-100C				50X					

Reviewed By:

02-21-08

Analyst: D. M.

1. 2.

Date/Time: 02/20/08

SOP #:

Method: P-TS

[illegible]

662	20 ml	20 ml	0.327	0.532	0.532	<u>66110</u>
662	↓	↓	0.003	0.008	0.008	

[illegible][illegible]

The graph is plotted on a grid with 10 vertical units and 10 horizontal units. The curve starts at the top left corner (0, 10), curves downwards to the right, passing through approximately (2, 8), and then continues as a straight line with a negative slope, passing through approximately (8, 2).

A blank coordinate grid with 10 vertical columns and 10 horizontal rows. A straight line is graphed, starting from the top-left corner of the grid and extending diagonally down to the right, passing through the intersection of the 5th vertical line and the 5th horizontal line from the bottom-left.

[illegible][illegible]

LCS / ICV ID #: 573-28-6	Reagent ID: 1-246-10-06	Reagent ID:	N/A	Reviewed By:
LCS Prep Date: 4/29/07	Prep Date: 02/20/08	Prep Date:		
		Reagent ID:		

CCV ID#:	577-28-7	Reagent ID:	1-46-6-0+
CCV Prep Date:	11/28/07	Prep Date:	02/29/08

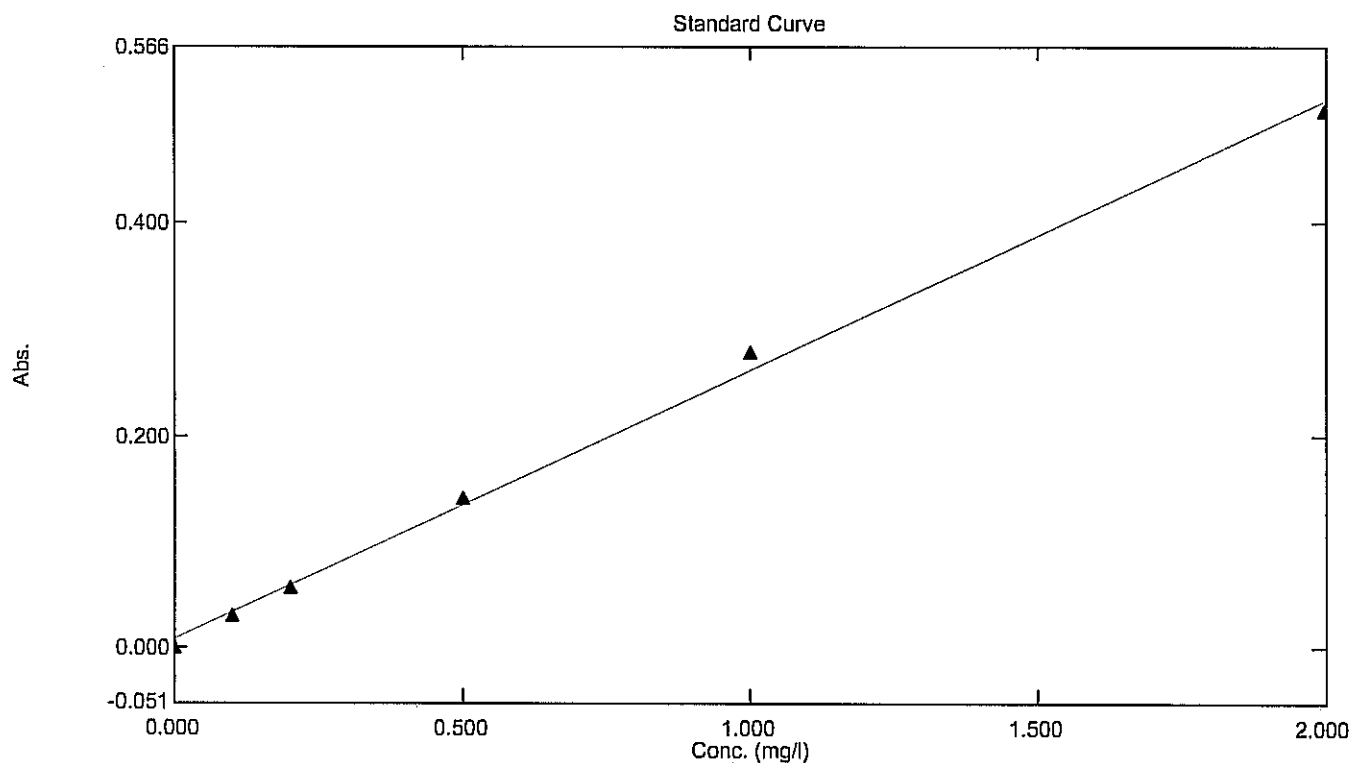
© 2008 Al Se-ah Analytical Inc. P. 2 of 2 Page 39 of 100

# Standard Table Report

02/29/2008 11:58:10 AM

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Files\Shimadzu\UVProbe\Data\CALIBRATION\SiO2\022608-SiO2-cal.pho



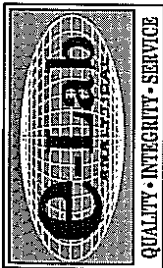
Multiple Correlation Coefficient  $r^2 = 0.99735$

Standard Table

	Sample ID	Type	Ex	Conc	WL815.0	Wgt.Factor	Comments
1	std1	Standard		0.000	0.000	1.000	
2	std2	Standard		0.100	0.029	1.000	
3	std3	Standard		0.200	0.056	1.000	
4	std4	Standard		0.500	0.141	1.000	
5	std5	Standard		1.000	0.278	1.000	
6	std6	Standard		2.000	0.506	1.000	
7							

SiO <sub>2</sub> - S-Soluble			SOP #:		WC-00		Date/Time: 2/26/08 11:45		Analyst: ZF	
WO # / SX #	Init Sample Vol (mL) or Wt (grams)	Prep Final Volume (mL)	Anal Dil Factor	Total Dil Factor	Abs.	Init Conc. (mg/L)	Final Conc. (mg/L)	Comments / Batch ID		
12811K51-022608	20g	200mL	N/A	10	-0.000	-0.030	0.00	R60293		
1cs ↓					0.138	0.514	5.14			
0802300-01C					0.422	1.631	16.31			
1 Dup ↓					0.413	1.598	15.98	*MS failed due to matrix		
MS ↓					0.522	2.028	20.28			
-02D					0.227	0.865	8.65			
-03C					0.362	1.398	13.98			
-04C					0.476	1.846	18.46			
-05D				✓	0.320	1.232	12.32			
-06C			2	20	0.369	1.425	20.5 20.85 <sup>5</sup>	20.85 of 2/26/08		
-07D			2	20	0.263	1.006	20.12			
✓ -08D			N/A	10	0.310	1.193	11.93			
0802304-01D			5	50	0.393	1.519	75.95			
↓ -02D				10	0.473	1.834	18.34			
-03D			2	20	0.462	1.790	35.8			
0802318-01C			2	20	0.429	1.659	33.18			
↓ -02D			2	20	0.266	1.017	20.34			
-03C			5	50	0.486	1.883	94.15			
↓ -04C	✓	✓	10	100	0.505	1.961	196.1			
cev	50	50	N/A	N/A	0.142		0.529			
ceB	↓	↓	1746	↓	-0.000		-0.032			
LCS / ICV ID #: 1-746-14-03			Reagent ID: 1-746-14-01		Reagent ID: 1-746-13-09		Reviewed By:			
LCS Prep Date: 2/25/08			Prep Date: 2/23/08		Prep Date: 2/23/08					
CCV ID#: 1-746-14-02			Reagent ID: 1-746-14-07		Reagent ID: 1-746-13-3					
CCV Prep Date: 2/25/08			Prep Date: 2/26/08		Prep Date: 2/22/08					

Analyst: TL	Date/Time In: 2/19/2008 12:00pm	Temp In Deg C:	105					
Review By: RPM	Date/Time Out: 2/20/2008 11:00am	Temp Out Deg C:	105					
Method: % Moisture	Batch ID: R60093							
SOP: WC-014 Rev 4								
WO #	Sample Type	Dish	Pan Wt	Wet Wt	1st Wt	2nd Wt	% Moisture	Analyte
0802346-04A	SAMP	1	1.2835	7.0349	5.674	5.676	37.56	Percent Moisture
0802346-04ADUP	DUP	2	1.2881	8.3122	6.5043	6.5072	37.21	Percent Moisture
0802334-01A	SAMP	3	1.2909	7.4407	7.0853	7.083	21.84	Percent Moisture
0802334-02A	SAMP	4	1.2802	5.8542	6.1711	6.1754	16.38	Percent Moisture
0802300-01C	SAMP	5	1.2875	6.0236	7.1688	7.1702	2.34	Percent Moisture
0802300-02C	SAMP	6	1.2984	7.5092	8.6177	8.6201	2.50	Percent Moisture
0802300-03C	SAMP	7	1.2821	7.9869	8.5706	8.5742	8.70	Percent Moisture
0802300-04C	SAMP	8	1.2893	8.7103	8.4197	8.4209	18.12	Percent Moisture
0802300-05C	SAMP	9	1.2932	9.4524	10.5599	10.5609	1.95	Percent Moisture
0802300-06C	SAMP	10	1.2847	7.6588	7.9831	7.9868	14.72	Percent Moisture
0802300-07D	SAMP	11	1.2876	8.2458	9.2586	9.2616	2.94	Percent Moisture
0802300-08C	SAMP	12	1.2844	6.0245	6.8819	6.8848	7.04	Percent Moisture
0802304-01D	SAMP	13	1.2905	8.8326	10.0111	10.0144	1.23	Percent Moisture
0802304-02D	SAMP	14	1.2873	8.2096	9.3381	9.3408	1.90	Percent Moisture
0802304-03D	SAMP	15	1.2922	8.0357	9.2209	9.2241	1.29	Percent Moisture
0802318-01C	SAMP	16	1.2954	6.9431	8.0428	8.0447	2.79	Percent Moisture
0802318-02C	SAMP	17	1.2937	7.1616	7.0237	7.0253	19.97	Percent Moisture
0802318-03C	SAMP	18	1.2879	6.7486	7.6419	7.6441	5.81	Percent Moisture
0802318-04C	SAMP	19	1.2952	6.9371	7.6494	7.6508	8.38	Percent Moisture
0802318-04CDUP	DUP	20	1.2947	6.9404	7.6683	7.6711	8.13	Percent Moisture
	SAMP	21					#DIV/0!	Percent Moisture
	DUP	22					#DIV/0!	Percent Moisture
							#DIV/0!	Percent Moisture
							#DIV/0!	Percent Moisture

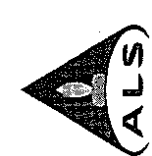


e-Lab Analytical, Inc.  
10450 Stancil Rd. #210  
Houston, Texas 77099  
(Tel) 281.530.5656  
(Fax) 281.530.5887

# Chain of Custody Form

Page 1 of 1

e-Lab Analytical, Inc.  
3352 128th Avenue  
Holland, Michigan 49424  
(Tel) 616.399.6070  
(Fax) 616.399.6185



Customer Information				Project Information				Project Manager:				Work Order #					
Purchase Order				Project Name				Oro Grande LF-Former Tar Area				Parameter/Method Request for Analysis					
Work Order				Project Number				5285-027				VOC (5035/8260) Select- Full list					
Company Name				Bill To Company				Malcolm Pirnie, Inc.				Total Metals (6020/7000) Select					
Send Report To				Invoice Attn				Michael Forlenza				PCBs (8082)					
Address				Address				1700 West Loop South				Pesticides, Chlorinated (8081)					
City/State/Zip				City/State/Zip				Houston, TX 77027				Herbicides (8151)					
Phone				Phone				(713) 840-1511				DRO					
Fax				Fax				(713) 840-1207				Total Cyanide (9012)					
e-Mail Address				e-Mail Address								Phosphorus					
No.	Sample Description	Date	Time	Matrix	Pres.	# Bottles	A	B	C	D	E	F	G	H	I	J	Hold
1	F14-SB-7(0-1)	2/12/08		Soil		1 Bottle	X	X		X	X	X	X	X	X	X	
2	F14-SB-8(0-1)	2/12/08		Soil		2 Bottle	X	X		X	X	X	X	X	X	X	
3	<del>F14-SB-9(0-1)</del> Dup-1	2/12/08		Soil		3 Bottle	X	X		X	X	X	X	X	X	X	
4																	
5																	
6																	
7																	
8																	
9																	
10																	

Sampler(s) Please Print & Sign		Shipment Method		Required Turnaround Time: (Check Box)		Results Due Date:	
Date	Time	Date	Time	5 WK Days	10 WK Days	2 WK Days	24 Hour
2/14/08	11:15			<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Relinquished by: <i>Ch. W. [Signature]</i>		Received by: <i>[Signature]</i>		Notes: 10 Day TAT. USACE-Level III Report.			
Relinquished by:		Received by:		QC Packager: (Check One Box Below)			
Date:		Date:		Level II Std QC		<input type="checkbox"/> TRRP Checklist	
Date:		Date:		Level III Std QC/Raw Data		<input type="checkbox"/> TRRP Level IV	
Date:		Date:		Level IV SW846/CLP		<input checked="" type="checkbox"/> Other	
Logged by (Laboratory):		Checked by (Laboratory):		Cooler ID:		Cooler Temp:	
Preservative Key: 1-HCl, 2-HNO <sub>3</sub> , 3-H <sub>2</sub> SO <sub>4</sub> , 4-NaOH, 5-Na <sub>2</sub> S <sub>2</sub> O <sub>3</sub> , 6-NaHSO <sub>4</sub> , 7-Other		8-4°C, 9-5035					

## Sample Receipt Checklist

Client Name: MALCOLM PIRNIEDate/Time Received: 2/15/2008 9:15:00 AMWork Order Number 0802304Received by: RNG

Checklist completed by

Signature

2/15/08  
Date

Reviewed by

Initials

4/18/08  
Date

Matrix:

Carrier name: FedEx

Shipping container/cooler in good condition?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	Not Present <input type="checkbox"/>
Custody seals intact on shipping container/cooler?	Yes <input type="checkbox"/>	No <input type="checkbox"/>	Not Present <input checked="" type="checkbox"/>
Custody seals intact on sample bottles?	Yes <input type="checkbox"/>	No <input type="checkbox"/>	Not Present <input checked="" type="checkbox"/>
Chain of custody present?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Chain of custody signed when relinquished and received?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Chain of custody agrees with sample labels?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Samples in proper container/bottle?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Sample containers intact?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Sufficient sample volume for indicated test?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
All samples received within holding time?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Container/Temp Blank temperature in compliance?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Temperature(s)/Thermometer(s):	<u>2.0c, 2.2c, 1.9c</u>	<u>004</u>	
Cooler(s)/Kit(s):	<u>388, 1336</u>		
Water - VOA vials have zero headspace?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	No VOA vials submitted <input type="checkbox"/>
Water - pH acceptable upon receipt?	Yes <input type="checkbox"/>	No <input type="checkbox"/>	N/A <input checked="" type="checkbox"/>

Adjusted?

Checked by

Login Notes: Trip Blank logged in without analysis.

Client contacted: \_\_\_\_\_

Date contacted: \_\_\_\_\_

Person contacted \_\_\_\_\_

Contacted by: \_\_\_\_\_


Regarding: \_\_\_\_\_

Comments: \_\_\_\_\_

Corrective Action




W01A 0803804

	<b>ALS e-Lab Analytical</b>
	10450 Stancliff Rd., Suite 210
	Houston, Texas 77099
	Tel. 281.530.5656 Fax. 218.530.5887

*MP1*  
*SOILS*  
*3 OF 3*

<b>CUSTODY SEAL</b>	
Date: <i>2-14-08</i>	Time: <i>1500</i>
Name: <i>JOE A.</i>	
Company: <i>MPI</i>	


Seal Broken By: <i>RVG</i>
Date: <i>2/15/08</i>

	<b>ALS e-Lab Analytical</b>
	10450 Stancliff Rd., Suite 210
	Houston, Texas 77099
	Tel. 281.530.5656 Fax. 218.530.5887

*MP1*  
*SOIL*  
*1 OF 3*

<b>CUSTODY SEAL</b>	
Date: <i>2/14/08</i>	Time: <i>10:00</i>
Name: <i>Colin Nelson</i>	
Company: <i>Malcolm Pirnie</i>	


Seal Broken By: <i>RVG</i>
Date: <i>2/15/08</i>

	<b>ALS e-Lab Analytical</b>
	10450 Stancliff Rd., Suite 210
	Houston, Texas 77099
	Tel. 281.530.5656 Fax. 218.530.5887

*MP1*  
*SOILS*  
*2 OF 3*

<b>CUSTODY SEAL</b>	
Date: <i>2-14-08</i>	Time: <i>150</i>
Name: <i>JOE A.</i>	
Company: <i>MPI</i>	

*RVG*  
*2/15/08*

	<b>ALS e-Lab Analytical</b>
	10450 Stancliff Rd., Suite 210
	Houston, Texas 77099
	Tel. 281.530.5656 Fax. 218.530.5887

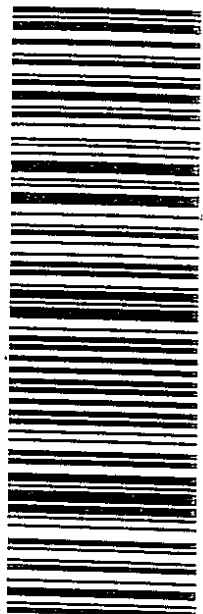
*RIAS*

<b>CUSTODY SEAL</b>	
Date: <i>2/14/08</i>	Time: <i>6:15 am</i>
Name: <i>Colin Nelson</i>	
Company: <i>Malcolm Pirnie</i>	

Seal Broken By: <i>RVG</i>
Date: <i>2/15/08</i>

Part # 156297-435 RIT 12/07

FedEx 0002/0005 FRI - 15 FEB A2  
PRIORITY OVERNIGHT  
NPS# 7955 1039 8788  
Mstr# 8641 7065 1889 0215  
388  
XH JGQA  
77099  
TX-US  
IAH



Part # 156297-435 RIT 12/07

FedEx 0003/0005 FRI - 15 FEB A2  
PRIORITY OVERNIGHT  
NPS# 7955 1039 8799  
Mstr# 8641 7065 1889 0215  
1306  
XH JGQA  
77099  
TX-US  
IAH



emp# 40322 14FEB08 13:37

Wio.# 0802804

Part # 156297-435 RIT 12/07

FedEx 0004/0005 FRI - 15 FEB A2  
PRIORITY OVERNIGHT  
NPS# 7955 1039 8803  
Mstr# 8641 7065 1889 0215  
1336  
XH JGQA  
77099  
TX-US  
IAH



Part # 156297-435 RIT 12/07

FedEx 0005/0005 FRI - 15 FEB A2  
PRIORITY OVERNIGHT  
NPS# 7955 1039 8814  
Mstr# 8641 7065 1889 0215  
1058  
XH JGQA  
77099  
TX-US  
IAH



emp# 40322 14FEB08 13:37

**ALL** THAT YOU NEED TO GET THE INFORMATION FOR THE QUESTIONS IS HERE.

HR 1

**FedEx Tracking Number**

BL4170651889

अर्धरस

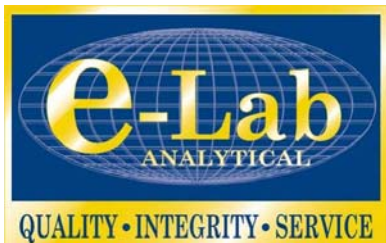
PhoneCompanyAddress

DEPL/FIDCS/EUNAF/CON

tvState

ZIP

**our internal Billing Reference**



February 29, 2008

Michael Forlenza  
Malcolm Pirnie, Inc.  
1700 West Loop South  
Suite 1450  
Houston, TX 77027

Tel: (713) 840-1511  
Fax: (713) 840-1207

Re: Oro Grande LF

Work Order : **0802326**

Dear Michael Forlenza,

e-Lab Analytical, Inc. received 12 samples on 2/18/2008 07:30 AM for the analyses presented in the following report.

The analytical data provided relates directly to the samples received by e-Lab Analytical, Inc. and for only the analyses requested. Results are expressed as "as received" unless otherwise noted.

QC sample results for this data met EPA or laboratory specifications except as noted in the Case Narrative or as noted with qualifiers in the QC batch information. Should this laboratory report need to be reproduced, it should be reproduced in full unless written approval has been obtained by e-Lab Analytical, Inc. Samples will be disposed in 30 days unless storage arrangements are made.

The total number of pages in this report is 236.

If you have any questions regarding this report, please feel free to call me.

Sincerely,

Electronically approved by: Glenda H. Ramos

Ed B. Fry  
Project Manager



Certificate No: T104704231-06-TX

**e.Lab Analytical, Inc.**  
Part of the **ALS Laboratory Group**  
10450 Stancliff Rd, Suite 210 Houston, Texas 77099-4338  
Phone: (281) 530-5656 Fax: (281) 530-5887  
[www.elabi.com](http://www.elabi.com) [www.alsglobal.com](http://www.alsglobal.com)  
*A Campbell Brothers Limited Company*

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Work Order:** 0802326

**Work Order Sample Summary**

<u>Lab Samp ID</u>	<u>Client Sample ID</u>	<u>Matrix</u>	<u>Tag Number</u>	<u>Collection Date</u>	<u>Date Received</u>	<u>Hold</u>
0802326-01	F14-SB-3 (0-2)	Soil		2/14/2008 14:30	2/18/2008 07:30	<input type="checkbox"/>
0802326-02	F14-SB-3 (13-15)	Soil		2/14/2008 15:00	2/18/2008 07:30	<input type="checkbox"/>
0802326-03	F14-SB-3 (28-30)	Soil		2/15/2008 08:00	2/18/2008 07:30	<input type="checkbox"/>
0802326-04	IDW-Comp	Soil		2/14/2008 16:05	2/18/2008 07:30	<input type="checkbox"/>
0802326-05	F14-SB-2 (0-2)	Soil		2/15/2008 16:37	2/18/2008 07:30	<input type="checkbox"/>
0802326-06	F14-SB-2 (13-15)	Soil		2/15/2008 17:05	2/18/2008 07:30	<input type="checkbox"/>
0802326-07	F14-SB-2 (28-30)	Soil		2/15/2008 19:00	2/18/2008 07:30	<input type="checkbox"/>
0802326-08	F14-SB-5 (0-2)	Soil		2/15/2008 13:00	2/18/2008 07:30	<input type="checkbox"/>
0802326-09	F14-SB-5 (13-15)	Soil		2/15/2008 13:10	2/18/2008 07:30	<input type="checkbox"/>
0802326-10	F14-SB-5 (28-30)	Soil		2/15/2008 14:17	2/18/2008 07:30	<input type="checkbox"/>
0802326-11	Trip Blank 2330	Water		2/15/2008 19:00	2/18/2008 07:30	<input type="checkbox"/>
0802326-12	Trip Blank 1598	Water		2/15/2008 19:00	2/18/2008 07:30	<input type="checkbox"/>

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Work Order:** 0802326

**Case Narrative**

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All samples were removed from HOLD status per client instructions and analyzed for parameters as listed on the COC. See attached documentation.

Batch 28371, Herbicides, MS/MSD are "P" qualified for MCPP due to coelution on the confirming column. Results are reported from the non-coeluting column.

Batch 28320, Metals, Sample 0802326-06, F14-SB-2 (13-15) : MS/MSD recoveries were outside control limits for some compounds. MS/MSD RPDs were outside control limits for Barium and Strontium. The duplicate RPD was outside control limits for Barium. Results are flagged with "E" and "O" qualifiers as applicable.

Batch 28295, Semivolatile Organics, Sample 0802300-03, F14-SB-1 (28-30) MS/MSD RPD was outside control limits for Pentachlorophenol. Individual recoveries were within control limits.

Batch R60320, Volatile Organics, Sample 0802326-01, F14-SB-3 (0-2): MS recoveries were outside control limits for several compounds. MSD recoveries and associated RPDs were within control limits.

Batch 28396, Phosphorus, Sample 0802326-10, F14-SB-5 (28-30) : MS recovery was below control limits for Total Phosphorus. Results are flagged with an "O" qualifier.

Batch R60294, Silica, Sample 0802326-02, F14-SB-3 (13-15) : MS recovery was below control limits for Dissolved Silica.

## e-Lab Analytical, Inc.

Date: February 29, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF  
 Sample ID: F14-SB-3 (0-2)  
 Collection Date: 2/14/2008 2:30:00 PM

Work Order: 0802326  
 Lab ID: 0802326-01  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	110			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	104			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	0.51	J	0.50	1.7	mg/Kg	1	2/22/2008
Surr: 2-Fluorobiphenyl	95.5			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	7.80	J	1.4	13.2	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/20/08		Analyst: <b>SA</b>
Aluminum	4,340		34	92.6	mg/Kg	100	2/21/2008
Antimony	U		0.13	0.463	mg/Kg	1	2/20/2008
Arsenic	2.59		0.12	0.463	mg/Kg	1	2/20/2008
Barium	124		0.065	0.463	mg/Kg	1	2/20/2008
Beryllium	0.269	J	0.028	0.463	mg/Kg	1	2/20/2008
Boron	3.01		0.37	2.31	mg/Kg	1	2/20/2008
Cadmium	0.0548	J	0.028	0.463	mg/Kg	1	2/20/2008
Calcium	61,600		930	4,630	mg/Kg	100	2/21/2008
Chromium	3.59		0.065	0.463	mg/Kg	1	2/20/2008
Cobalt	1.89		0.016	0.463	mg/Kg	1	2/20/2008
Copper	2.15		0.037	0.463	mg/Kg	1	2/20/2008
Iron	4,660		4.1	46.3	mg/Kg	1	2/20/2008
Lead	3.41		0.083	0.463	mg/Kg	1	2/20/2008
Magnesium	2,530		2.4	46.3	mg/Kg	1	2/20/2008
Manganese	74.6		0.046	0.463	mg/Kg	1	2/20/2008
Molybdenum	0.216	J	0.093	0.463	mg/Kg	1	2/20/2008
Nickel	3.37		0.074	0.463	mg/Kg	1	2/20/2008
Potassium	1,160		2.4	46.3	mg/Kg	1	2/20/2008
Selenium	0.709		0.18	0.463	mg/Kg	1	2/20/2008
Silver	0.103	J	0.019	0.463	mg/Kg	1	2/20/2008
Sodium	74.7		8.4	46.3	mg/Kg	1	2/20/2008
Strontium	130		0.093	0.463	mg/Kg	1	2/20/2008

Qualifiers: U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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## e-Lab Analytical, Inc.

Date: February 29, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF  
 Sample ID: F14-SB-3 (0-2)  
 Collection Date: 2/14/2008 2:30:00 PM

Work Order: 0802326  
 Lab ID: 0802326-01  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	U		0.046	0.463	mg/Kg	1	2/20/2008
Tin	0.945	J	0.37	2.31	mg/Kg	1	2/20/2008
Titanium	91.8		0.065	0.463	mg/Kg	1	2/20/2008
Vanadium	11.9		0.052	0.463	mg/Kg	1	2/20/2008
Zinc	10.3		0.093	0.463	mg/Kg	1	2/20/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: SW6020		Prep: SW3050A / 2/22/08		Analyst: SA
Lithium	U		4.9	4.90	mg/Kg	1	2/27/2008
<b>TCL VOLATILE ORGANICS</b>			Method: SW8260		Analyst: RKG		
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/26/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/26/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/26/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/26/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/26/2008
Acetone	U		2.0	25	µg/Kg	1	2/26/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Bromoform	U		0.50	10	µg/Kg	1	2/26/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/26/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/26/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/26/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/26/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/26/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/26/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/26/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/26/2008

Qualifiers: U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-3 (0-2)  
**Collection Date:** 2/14/2008 2:30:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-01  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Dichloromethane	U		3.0	10	µg/Kg	1	2/26/2008
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/26/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/26/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/26/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/26/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/26/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/26/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/26/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/26/2008
Surr: 1,2-Dichloroethane-d4	95.8			70-128	%REC	1	2/26/2008
Surr: 4-Bromofluorobenzene	99.2			73-126	%REC	1	2/26/2008
Surr: Dibromofluoromethane	97.1			71-128	%REC	1	2/26/2008
Surr: Toluene-d8	97.0			73-127	%REC	1	2/26/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/25/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/25/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
Percent Moisture	<b>3.32</b>		<b>0.010</b>	<b>0.0100</b>	wt%	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>			Prep: E365.3 / 2/26/08	Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		1.3	1.30	mg/Kg	10	2/26/2008
<b>Phosphorus, Total (As P)</b>	<b>140</b>		<b>2.0</b>	<b>5.00</b>	mg/Kg	10	2/26/2008
Phosphorus, Total Orthophosphate (As P)	U		1.3	1.30	mg/Kg	10	2/26/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SID</b>				Analyst: <b>IGF</b>
Silica, Dissolved (as SiO2)	<b>9.37</b>		<b>0.020</b>	<b>0.100</b>	mg/kg	1	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-3 (13-15)  
**Collection Date:** 2/14/2008 3:00:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-02  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>MISCELLANEOUS PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
alpha-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
gamma-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
<b>ORGANOCHLORINE PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
4,4'-DDD	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDE	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDT	U		0.23	3.3	µg/Kg	1	2/24/2008
Aldrin	U		0.20	1.7	µg/Kg	1	2/24/2008
alpha-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
beta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Chlordane	U		3.0	17	µg/Kg	1	2/24/2008
delta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Dieldrin	U		0.20	3.3	µg/Kg	1	2/24/2008
Endosulfan I	U		0.20	1.7	µg/Kg	1	2/24/2008
Endosulfan II	U		0.30	3.3	µg/Kg	1	2/24/2008
Endosulfan sulfate	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin	U		0.22	3.3	µg/Kg	1	2/24/2008
Endrin aldehyde	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin ketone	U		0.25	3.3	µg/Kg	1	2/24/2008
gamma-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor epoxide	U		0.20	1.7	µg/Kg	1	2/24/2008
Methoxychlor	U		1.7	17	µg/Kg	1	2/24/2008
Toxaphene	U		5.8	17	µg/Kg	1	2/24/2008
Surr: Decachlorobiphenyl	93.4			59-144	%REC	1	2/24/2008
Surr: Tetrachloro-m-xylene	83.7			56.9-130	%REC	1	2/24/2008
<b>CHLORINATED HERBICIDES</b>							
			Method: <b>SW8151</b>		Prep: SW3550 / 2/22/08		Analyst: <b>JLJ</b>
2,4,5-T	U		0.60	3.3	µg/Kg	1	2/24/2008
2,4,5-TP (Silvex)	U		0.50	3.3	µg/Kg	1	2/24/2008
2,4-D	U		1.0	6.6	µg/Kg	1	2/24/2008
2,4-DB	U		1.7	6.6	µg/Kg	1	2/24/2008
Dalapon	U		1.6	3.3	µg/Kg	1	2/24/2008
Dicamba	U		1.5	3.3	µg/Kg	1	2/24/2008
Dichlorprop	U		3.0	6.6	µg/Kg	1	2/24/2008
Dinoseb	U		0.50	3.3	µg/Kg	1	2/24/2008
MCPA	U		150	660	µg/Kg	1	2/24/2008
MCPP	U		140	660	µg/Kg	1	2/24/2008
Surr: DCAA	68.7			30-150	%REC	1	2/24/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

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## e-Lab Analytical, Inc.

Date: February 29, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF  
 Sample ID: F14-SB-3 (13-15)  
 Collection Date: 2/14/2008 3:00:00 PM

Work Order: 0802326  
 Lab ID: 0802326-02  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	111			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	109			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	U		0.50	1.7	mg/Kg	1	2/22/2008
Surr: 2-Fluorobiphenyl	100			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	U		1.4	13.3	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/20/08		Analyst: <b>SA</b>
Aluminum	2,960		36	97.1	mg/Kg	100	2/21/2008
Antimony	U		0.14	0.485	mg/Kg	1	2/20/2008
Arsenic	2.18		0.13	0.485	mg/Kg	1	2/20/2008
Barium	36.1		0.068	0.485	mg/Kg	1	2/20/2008
Beryllium	0.184	J	0.029	0.485	mg/Kg	1	2/20/2008
Boron	4.47		0.39	2.43	mg/Kg	1	2/20/2008
Cadmium	U		0.029	0.485	mg/Kg	1	2/20/2008
Calcium	12,900		9.7	48.5	mg/Kg	1	2/20/2008
Chromium	3.24		0.068	0.485	mg/Kg	1	2/20/2008
Cobalt	1.18		0.017	0.485	mg/Kg	1	2/20/2008
Copper	1.26		0.039	0.485	mg/Kg	1	2/20/2008
Iron	3,360		4.3	48.5	mg/Kg	1	2/20/2008
Lead	2.57		0.087	0.485	mg/Kg	1	2/20/2008
Magnesium	1,790		2.5	48.5	mg/Kg	1	2/20/2008
Manganese	52.3		0.049	0.485	mg/Kg	1	2/20/2008
Molybdenum	0.157	J	0.097	0.485	mg/Kg	1	2/20/2008
Nickel	2.29		0.078	0.485	mg/Kg	1	2/20/2008
Potassium	914		2.5	48.5	mg/Kg	1	2/20/2008
Selenium	0.359	J	0.18	0.485	mg/Kg	1	2/20/2008
Silver	0.102	J	0.019	0.485	mg/Kg	1	2/20/2008
Sodium	452		8.8	48.5	mg/Kg	1	2/20/2008
Strontium	59.1		0.097	0.485	mg/Kg	1	2/20/2008

Qualifiers: U - Analyzed for but Not Detected

S - Spike Recovery outside accepted recovery limits

J - Analyte detected below quantitation limits

P - Dual Column results RPD &gt; 40%

B - Analyte detected in the associated Method Blank

E - Value above quantitation range

\* - Value exceeds Maximum Contaminant Level

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-3 (13-15)  
**Collection Date:** 2/14/2008 3:00:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-02  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	U		0.049	0.485	mg/Kg	1	2/20/2008
<b>Tin</b>	<b>1.10</b>	J	<b>0.39</b>	<b>2.43</b>	<b>mg/Kg</b>	1	2/20/2008
<b>Titanium</b>	<b>75.0</b>		<b>0.068</b>	<b>0.485</b>	<b>mg/Kg</b>	1	2/20/2008
<b>Vanadium</b>	<b>13.8</b>		<b>0.054</b>	<b>0.485</b>	<b>mg/Kg</b>	1	2/20/2008
<b>Zinc</b>	<b>7.10</b>		<b>0.097</b>	<b>0.485</b>	<b>mg/Kg</b>	1	2/20/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>
Lithium	U		4.6	4.59	mg/Kg	1	2/27/2008
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>		Analyst: <b>RKG</b>		
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/26/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/26/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/26/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/26/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/26/2008
Acetone	U		2.0	25	µg/Kg	1	2/26/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Bromoform	U		0.50	10	µg/Kg	1	2/26/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/26/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/26/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/26/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/26/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/26/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/26/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/26/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-3 (13-15)  
**Collection Date:** 2/14/2008 3:00:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-02  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Dichloromethane	U		3.0	10	µg/Kg	1	2/26/2008
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/26/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/26/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/26/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/26/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/26/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/26/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/26/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/26/2008
Surr: 1,2-Dichloroethane-d4	93.1			70-128	%REC	1	2/26/2008
Surr: 4-Bromofluorobenzene	99.6			73-126	%REC	1	2/26/2008
Surr: Dibromofluoromethane	94.4			71-128	%REC	1	2/26/2008
Surr: Toluene-d8	96.5			73-127	%REC	1	2/26/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/25/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/25/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
Percent Moisture	<b>5.77</b>		<b>0.010</b>	<b>0.0100</b>	wt%	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>			Prep: E365.3 / 2/26/08	Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.13	0.130	mg/Kg	1	2/26/2008
<b>Phosphorus, Total (As P)</b>	<b>19.8</b>		<b>0.20</b>	<b>0.500</b>	mg/Kg	1	2/26/2008
Phosphorus, Total Orthophosphate (As P)	U		0.13	0.130	mg/Kg	1	2/26/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SID</b>				Analyst: <b>IGF</b>
Silica, Dissolved (as SiO2)	<b>9.21</b>		<b>0.020</b>	<b>0.100</b>	mg/kg	1	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

## e-Lab Analytical, Inc.

Date: February 29, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF  
 Sample ID: F14-SB-3 (28-30)  
 Collection Date: 2/15/2008 8:00:00 AM

Work Order: 0802326  
 Lab ID: 0802326-03  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	109			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	106			55-137	%REC	1	2/26/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	U		1.4	13.2	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/20/08		Analyst: <b>SA</b>
Aluminum	3,020		36	97.1	mg/Kg	100	2/21/2008
Antimony	U		0.14	0.485	mg/Kg	1	2/20/2008
Arsenic	2.69		0.13	0.485	mg/Kg	1	2/20/2008
Barium	58.7		0.068	0.485	mg/Kg	1	2/20/2008
Beryllium	0.213	J	0.029	0.485	mg/Kg	1	2/20/2008
Boron	5.01		0.39	2.43	mg/Kg	1	2/20/2008
Cadmium	0.0380	J	0.029	0.485	mg/Kg	1	2/20/2008
Calcium	43,400		970	4,850	mg/Kg	100	2/21/2008
Chromium	3.22		0.068	0.485	mg/Kg	1	2/20/2008
Cobalt	1.64		0.017	0.485	mg/Kg	1	2/20/2008
Copper	1.64		0.039	0.485	mg/Kg	1	2/20/2008
Iron	3,890		4.3	48.5	mg/Kg	1	2/20/2008
Lead	2.98		0.087	0.485	mg/Kg	1	2/20/2008
Magnesium	2,260		2.5	48.5	mg/Kg	1	2/20/2008
Manganese	79.0		0.049	0.485	mg/Kg	1	2/20/2008
Molybdenum	0.225	J	0.097	0.485	mg/Kg	1	2/20/2008
Nickel	2.50		0.078	0.485	mg/Kg	1	2/20/2008
Potassium	1,040		2.5	48.5	mg/Kg	1	2/20/2008
Selenium	0.538		0.18	0.485	mg/Kg	1	2/20/2008
Silver	0.101	J	0.019	0.485	mg/Kg	1	2/20/2008
Sodium	273		8.8	48.5	mg/Kg	1	2/20/2008
Strontium	107		0.097	0.485	mg/Kg	1	2/20/2008
Thallium	U		0.049	0.485	mg/Kg	1	2/20/2008
Tin	1.03	J	0.39	2.43	mg/Kg	1	2/20/2008
Titanium	104		0.068	0.485	mg/Kg	1	2/20/2008
Vanadium	13.7		0.054	0.485	mg/Kg	1	2/20/2008

Qualifiers: U - Analyzed for but Not Detected

S - Spike Recovery outside accepted recovery limits

J - Analyte detected below quantitation limits

P - Dual Column results RPD &gt; 40%

B - Analyte detected in the associated Method Blank

E - Value above quantitation range

\* - Value exceeds Maximum Contaminant Level

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-3 (28-30)  
**Collection Date:** 2/15/2008 8:00:00 AM

**Work Order:** 0802326  
**Lab ID:** 0802326-03  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>Zinc</b>	<b>8.96</b>		<b>0.097</b>	<b>0.485</b>	<b>mg/Kg</b>	<b>1</b>	<b>2/20/2008</b>
<b>ICP METALS, TOTAL - SW6020A</b>		Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>	
Lithium	U		4.8	4.81	mg/Kg	1	2/27/2008
<b>LOW-LEVEL TCL SEMIVOLATILE ORGANICS</b>		Method: <b>SW8270</b>		Prep: SW3541 / 2/19/08		Analyst: <b>LG</b>	
1,1'-Biphenyl	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,5-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,6-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dimethylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dinitrophenol	U		30	30	µg/Kg	1	2/20/2008
2,4-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2,6-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chloronaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylnaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3&4-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3,3'-Dichlorobenzidine	U		6.6	6.6	µg/Kg	1	2/20/2008
3-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4,6-Dinitro-2-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Bromophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloro-3-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chlorophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Nitroaniline	U		30	30	µg/Kg	1	2/20/2008
4-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acetophenone	U		6.6	6.6	µg/Kg	1	2/20/2008
Anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Atrazine	U		6.6	6.6	µg/Kg	1	2/20/2008
Benz(a)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzaldehyde	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(a)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(b)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(g,h,i)perylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(k)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

## e-Lab Analytical, Inc.

Date: February 29, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF  
 Sample ID: F14-SB-3 (28-30)  
 Collection Date: 2/15/2008 8:00:00 AM

Work Order: 0802326  
 Lab ID: 0802326-03  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Bis(2-chloroethoxy)methane	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroethyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroisopropyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Bis(2-ethylhexyl)phthalate</b>	<b>17</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Butyl benzyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Caprolactam	U		6.6	6.6	µg/Kg	1	2/20/2008
Carbazole	U		6.6	6.6	µg/Kg	1	2/20/2008
Chrysene	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Di-n-butyl phthalate</b>	<b>15</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Di-n-octyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenz(a,h)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenzofuran	U		6.6	6.6	µg/Kg	1	2/20/2008
Diethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dimethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluorene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobutadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorocyclopentadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachloroethane	U		6.6	6.6	µg/Kg	1	2/20/2008
Indeno(1,2,3-cd)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Isophorone	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodi-n-propylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodiphenylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
Naphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
Nitrobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Pentachlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenanthrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Surr: 2,4,6-Tribromophenol	64.1			36-126	%REC	1	2/20/2008
Surr: 2-Fluorobiphenyl	74.9			43-125	%REC	1	2/20/2008
Surr: 2-Fluorophenol	81.4			37-125	%REC	1	2/20/2008
Surr: 4-Terphenyl-d14	96.3			32-125	%REC	1	2/20/2008
Surr: Nitrobenzene-d5	69.0			37-125	%REC	1	2/20/2008
Surr: Phenol-d6	85.1			40-125	%REC	1	2/20/2008
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>				Analyst: <b>RKG</b>
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/26/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1,2-Trichloro-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/26/2008

Qualifiers: U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-3 (28-30)  
**Collection Date:** 2/15/2008 8:00:00 AM

**Work Order:** 0802326  
**Lab ID:** 0802326-03  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/26/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/26/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/26/2008
Acetone	U		2.0	25	µg/Kg	1	2/26/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Bromoform	U		0.50	10	µg/Kg	1	2/26/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/26/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/26/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/26/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/26/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/26/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/26/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/26/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/26/2008
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Dichloromethane	U		3.0	10	µg/Kg	1	2/26/2008
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/26/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/26/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/26/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/26/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/26/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/26/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**
**Date:** February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-3 (28-30)  
**Collection Date:** 2/15/2008 8:00:00 AM

**Work Order:** 0802326  
**Lab ID:** 0802326-03  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/26/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/26/2008
Surr: 1,2-Dichloroethane-d4	90.5			70-128	%REC	1	2/26/2008
Surr: 4-Bromofluorobenzene	103			73-126	%REC	1	2/26/2008
Surr: Dibromofluoromethane	96.7			71-128	%REC	1	2/26/2008
Surr: Toluene-d8	102			73-127	%REC	1	2/26/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/25/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/25/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
Percent Moisture	<b>4.46</b>		<b>0.010</b>	<b>0.0100</b>	wt%	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>		Prep: E365.3 / 2/26/08		Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.13	0.130	mg/Kg	1	2/26/2008
<b>Phosphorus, Total (As P)</b>	<b>28.2</b>		<b>0.20</b>	<b>0.500</b>	<b>mg/Kg</b>	1	2/26/2008
Phosphorus, Total Orthophosphate (As P)	U		0.13	0.130	mg/Kg	1	2/26/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SID</b>				Analyst: <b>IGF</b>
Silica, Dissolved (as SiO2)	<b>13.4</b>		<b>0.020</b>	<b>0.100</b>	mg/kg	1	2/26/2008

**Qualifiers:**

U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** IDW-Comp  
**Collection Date:** 2/14/2008 4:05:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-04  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>MISCELLANEOUS PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
alpha-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
gamma-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
<b>ORGANOCHLORINE PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
4,4'-DDD	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDE	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDT	U		0.23	3.3	µg/Kg	1	2/24/2008
Aldrin	U		0.20	1.7	µg/Kg	1	2/24/2008
alpha-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
beta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Chlordane	U		3.0	17	µg/Kg	1	2/24/2008
delta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Dieldrin	U		0.20	3.3	µg/Kg	1	2/24/2008
Endosulfan I	U		0.20	1.7	µg/Kg	1	2/24/2008
Endosulfan II	U		0.30	3.3	µg/Kg	1	2/24/2008
Endosulfan sulfate	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin	U		0.22	3.3	µg/Kg	1	2/24/2008
Endrin aldehyde	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin ketone	U		0.25	3.3	µg/Kg	1	2/24/2008
gamma-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor epoxide	U		0.20	1.7	µg/Kg	1	2/24/2008
Methoxychlor	U		1.7	17	µg/Kg	1	2/24/2008
Toxaphene	U		5.8	17	µg/Kg	1	2/24/2008
Surr: Decachlorobiphenyl	91.7			59-144	%REC	1	2/24/2008
Surr: Tetrachloro-m-xylene	82.8			56.9-130	%REC	1	2/24/2008
<b>CHLORINATED HERBICIDES</b>							
			Method: <b>SW8151</b>		Prep: SW3550 / 2/22/08		Analyst: <b>JLJ</b>
2,4,5-T	U		0.60	3.3	µg/Kg	1	2/24/2008
2,4,5-TP (Silvex)	U		0.50	3.3	µg/Kg	1	2/24/2008
2,4-D	U		1.0	6.6	µg/Kg	1	2/24/2008
2,4-DB	U		1.7	6.6	µg/Kg	1	2/24/2008
Dalapon	U		1.6	3.3	µg/Kg	1	2/24/2008
Dicamba	U		1.5	3.3	µg/Kg	1	2/24/2008
Dichlorprop	U		3.0	6.6	µg/Kg	1	2/24/2008
Dinoseb	U		0.50	3.3	µg/Kg	1	2/24/2008
MCPA	U		150	660	µg/Kg	1	2/24/2008
MCPP	U		140	660	µg/Kg	1	2/24/2008
Surr: DCAA	105			30-150	%REC	1	2/24/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** IDW-Comp  
**Collection Date:** 2/14/2008 4:05:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-04  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	114			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	111			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	U		0.50	1.7	mg/Kg	1	2/22/2008
Surr: 2-Fluorobiphenyl	70.4			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	U		1.4	13.1	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/20/08		Analyst: <b>SA</b>
Aluminum	3,880		36	96.2	mg/Kg	100	2/21/2008
Antimony	U		0.13	0.481	mg/Kg	1	2/20/2008
Arsenic	2.11		0.12	0.481	mg/Kg	1	2/20/2008
Barium	69.7		0.067	0.481	mg/Kg	1	2/20/2008
Beryllium	0.233	J	0.029	0.481	mg/Kg	1	2/20/2008
Boron	4.54		0.38	2.40	mg/Kg	1	2/20/2008
Cadmium	0.0378	J	0.029	0.481	mg/Kg	1	2/20/2008
Calcium	29,900		960	4,810	mg/Kg	100	2/21/2008
Chromium	3.86		0.067	0.481	mg/Kg	1	2/20/2008
Cobalt	1.75		0.016	0.481	mg/Kg	1	2/20/2008
Copper	1.81		0.038	0.481	mg/Kg	1	2/20/2008
Iron	4,250		4.2	48.1	mg/Kg	1	2/20/2008
Lead	3.46		0.087	0.481	mg/Kg	1	2/20/2008
Magnesium	2,330		2.5	48.1	mg/Kg	1	2/20/2008
Manganese	76.0		0.048	0.481	mg/Kg	1	2/20/2008
Molybdenum	0.216	J	0.096	0.481	mg/Kg	1	2/20/2008
Nickel	2.82		0.077	0.481	mg/Kg	1	2/20/2008
Potassium	1,050		2.5	48.1	mg/Kg	1	2/20/2008
Selenium	0.579		0.18	0.481	mg/Kg	1	2/20/2008
Silver	0.102	J	0.019	0.481	mg/Kg	1	2/20/2008
Sodium	288		8.8	48.1	mg/Kg	1	2/20/2008
Strontium	74.7		0.096	0.481	mg/Kg	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** IDW-Comp  
**Collection Date:** 2/14/2008 4:05:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-04  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	U		0.048	0.481	mg/Kg	1	2/20/2008
Tin	1.04	J	0.38	2.40	mg/Kg	1	2/20/2008
Titanium	114		0.067	0.481	mg/Kg	1	2/20/2008
Vanadium	12.6		0.054	0.481	mg/Kg	1	2/20/2008
Zinc	10.3		0.096	0.481	mg/Kg	1	2/20/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>
Lithium	5.22		4.8	4.81	mg/Kg	1	2/27/2008
<b>LOW-LEVEL TCL SEMIVOLATILE ORGANICS</b>			Method: <b>SW8270</b>		Prep: SW3541 / 2/19/08		Analyst: <b>LG</b>
1,1'-Biphenyl	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,5-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,6-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dimethylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dinitrophenol	U		30	30	µg/Kg	1	2/20/2008
2,4-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2,6-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chloronaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylnaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3&4-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3,3'-Dichlorobenzidine	U		6.6	6.6	µg/Kg	1	2/20/2008
3-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4,6-Dinitro-2-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Bromophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloro-3-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chlorophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Nitroaniline	U		30	30	µg/Kg	1	2/20/2008
4-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acetophenone	U		6.6	6.6	µg/Kg	1	2/20/2008
Anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Atrazine	U		6.6	6.6	µg/Kg	1	2/20/2008
Benz(a)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzaldehyde	U		6.6	6.6	µg/Kg	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** IDW-Comp  
**Collection Date:** 2/14/2008 4:05:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-04  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Benzo(a)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(b)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(g,h,i)perylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(k)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroethoxy)methane	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroethyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroisopropyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Bis(2-ethylhexyl)phthalate</b>	<b>18</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Butyl benzyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Caprolactam	U		6.6	6.6	µg/Kg	1	2/20/2008
Carbazole	U		6.6	6.6	µg/Kg	1	2/20/2008
Chrysene	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Di-n-butyl phthalate</b>	<b>13</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Di-n-octyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenz(a,h)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenzofuran	U		6.6	6.6	µg/Kg	1	2/20/2008
Diethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dimethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluorene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobutadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorocyclopentadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachloroethane	U		6.6	6.6	µg/Kg	1	2/20/2008
Indeno(1,2,3-cd)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Isophorone	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodi-n-propylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodiphenylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
Naphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
Nitrobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Pentachlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenanthrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Surr: 2,4,6-Tribromophenol	69.6			36-126	%REC	1	2/20/2008
Surr: 2-Fluorobiphenyl	76.8			43-125	%REC	1	2/20/2008
Surr: 2-Fluorophenol	80.7			37-125	%REC	1	2/20/2008
Surr: 4-Terphenyl-d14	94.3			32-125	%REC	1	2/20/2008
Surr: Nitrobenzene-d5	70.4			37-125	%REC	1	2/20/2008
Surr: Phenol-d6	86.0			40-125	%REC	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** IDW-Comp  
**Collection Date:** 2/14/2008 4:05:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-04  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>			Analyst: <b>RKG</b>	
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/26/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/26/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/26/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/26/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/26/2008
Acetone	U		2.0	25	µg/Kg	1	2/26/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Bromoform	U		0.50	10	µg/Kg	1	2/26/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/26/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/26/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/26/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/26/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/26/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/26/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/26/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/26/2008
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Dichloromethane	U		3.0	10	µg/Kg	1	2/26/2008
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/26/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/26/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/26/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**
**Date:** February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** IDW-Comp  
**Collection Date:** 2/14/2008 4:05:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-04  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Styrene	U		0.70	5.0	µg/Kg	1	2/26/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/26/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/26/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/26/2008
Surr: 1,2-Dichloroethane-d4	101			70-128	%REC	1	2/26/2008
Surr: 4-Bromofluorobenzene	100			73-126	%REC	1	2/26/2008
Surr: Dibromofluoromethane	101			71-128	%REC	1	2/26/2008
Surr: Toluene-d8	98.2			73-127	%REC	1	2/26/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>			Analyst: <b>RPM</b>	
Cyanide	U		0.60	2.00	mg/Kg	1	2/25/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/25/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>			Analyst: <b>TL</b>	
Percent Moisture	1.92		0.010	0.0100	wt%	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>			Analyst: <b>DM</b>	
Phosphorus, Dissolved (As P)	U		0.65	0.650	mg/Kg	5	2/26/2008
Phosphorus, Total (As P)	106		1.0	2.50	mg/Kg	5	2/26/2008
Phosphorus, Total Orthophosphate (As P)	U		0.65	0.650	mg/Kg	5	2/26/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SID</b>			Analyst: <b>IGF</b>	
Silica, Dissolved (as SiO2)	19.6		0.020	0.100	mg/kg	1	2/26/2008

**Qualifiers:**

U - Analyzed for but Not Detected  
 J - Analyte detected below quantitation limits  
 B - Analyte detected in the associated Method Blank  
 \* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits  
 P - Dual Column results RPD > 40%  
 E - Value above quantitation range  
 H - Analyzed outside of Hold Time



# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-2 (0-2)  
**Collection Date:** 2/15/2008 4:37:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-05  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	116			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	116			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	1.6	J	0.50	1.7	mg/Kg	1	2/22/2008
Surr: 2-Fluorobiphenyl	70.9			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	3.56	J	1.4	13.2	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/20/08		Analyst: <b>SA</b>
Aluminum	3,960		35	94.3	mg/Kg	100	2/21/2008
Antimony	0.199	J	0.13	0.472	mg/Kg	1	2/20/2008
Arsenic	2.16		0.12	0.472	mg/Kg	1	2/20/2008
Barium	60.0		0.066	0.472	mg/Kg	1	2/20/2008
Beryllium	0.254	J	0.028	0.472	mg/Kg	1	2/20/2008
Boron	3.36		0.38	2.36	mg/Kg	1	2/20/2008
Cadmium	0.0519	J	0.028	0.472	mg/Kg	1	2/20/2008
Calcium	28,500		940	4,720	mg/Kg	100	2/21/2008
Chromium	3.74		0.066	0.472	mg/Kg	1	2/20/2008
Cobalt	1.80		0.016	0.472	mg/Kg	1	2/20/2008
Copper	2.10		0.038	0.472	mg/Kg	1	2/20/2008
Iron	4,240		4.2	47.2	mg/Kg	1	2/20/2008
Lead	3.28		0.085	0.472	mg/Kg	1	2/20/2008
Magnesium	2,040		2.5	47.2	mg/Kg	1	2/20/2008
Manganese	73.3		0.047	0.472	mg/Kg	1	2/20/2008
Molybdenum	0.246	J	0.094	0.472	mg/Kg	1	2/20/2008
Nickel	2.92		0.075	0.472	mg/Kg	1	2/20/2008
Potassium	1,060		2.5	47.2	mg/Kg	1	2/20/2008
Selenium	0.407	J	0.18	0.472	mg/Kg	1	2/20/2008
Silver	0.116	J	0.019	0.472	mg/Kg	1	2/20/2008
Sodium	U		8.6	47.2	mg/Kg	1	2/20/2008
Strontium	68.8		0.094	0.472	mg/Kg	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-2 (0-2)  
**Collection Date:** 2/15/2008 4:37:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-05  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	0.0651	J	0.047	0.472	mg/Kg	1	2/20/2008
Tin	1.04	J	0.38	2.36	mg/Kg	1	2/20/2008
Titanium	104		0.066	0.472	mg/Kg	1	2/20/2008
Vanadium	12.0		0.053	0.472	mg/Kg	1	2/20/2008
Zinc	10.0		0.094	0.472	mg/Kg	1	2/20/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>
Lithium	U		4.8	4.76	mg/Kg	1	2/27/2008
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>				Analyst: <b>RKG</b>
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/26/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/26/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/26/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/26/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/26/2008
Acetone	U		2.0	25	µg/Kg	1	2/26/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Bromoform	U		0.50	10	µg/Kg	1	2/26/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/26/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/26/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/26/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/26/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/26/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/26/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/26/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-2 (0-2)  
**Collection Date:** 2/15/2008 4:37:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-05  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Dichloromethane	U		3.0	10	µg/Kg	1	2/26/2008
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/26/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/26/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/26/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/26/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/26/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/26/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/26/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/26/2008
Surr: 1,2-Dichloroethane-d4	103			70-128	%REC	1	2/26/2008
Surr: 4-Bromofluorobenzene	101			73-126	%REC	1	2/26/2008
Surr: Dibromofluoromethane	101			71-128	%REC	1	2/26/2008
Surr: Toluene-d8	99.9			73-127	%REC	1	2/26/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>			Analyst: <b>RPM</b>	
Cyanide	U		0.60	2.00	mg/Kg	1	2/21/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/21/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>			Analyst: <b>TL</b>	
Percent Moisture	2.71		0.010	0.0100	wt%	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>			Analyst: <b>DM</b>	
Phosphorus, Dissolved (As P)	U		0.65	0.650	mg/Kg	5	2/26/2008
Phosphorus, Total (As P)	71.2		1.0	2.50	mg/Kg	5	2/26/2008
Phosphorus, Total Orthophosphate (As P)	U		0.65	0.650	mg/Kg	5	2/26/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SID</b>			Analyst: <b>IGF</b>	
Silica, Dissolved (as SiO2)	29.6		0.040	0.200	mg/kg	2	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-2 (13-15)  
**Collection Date:** 2/15/2008 5:05:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-06  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>MISCELLANEOUS PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
alpha-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
gamma-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
<b>ORGANOCHLORINE PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
4,4'-DDD	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDE	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDT	U		0.23	3.3	µg/Kg	1	2/24/2008
Aldrin	U		0.20	1.7	µg/Kg	1	2/24/2008
alpha-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
beta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Chlordane	U		3.0	17	µg/Kg	1	2/24/2008
delta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Dieldrin	U		0.20	3.3	µg/Kg	1	2/24/2008
Endosulfan I	U		0.20	1.7	µg/Kg	1	2/24/2008
Endosulfan II	U		0.30	3.3	µg/Kg	1	2/24/2008
Endosulfan sulfate	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin	U		0.22	3.3	µg/Kg	1	2/24/2008
Endrin aldehyde	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin ketone	U		0.25	3.3	µg/Kg	1	2/24/2008
gamma-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor epoxide	U		0.20	1.7	µg/Kg	1	2/24/2008
Methoxychlor	U		1.7	17	µg/Kg	1	2/24/2008
Toxaphene	U		5.8	17	µg/Kg	1	2/24/2008
Surr: Decachlorobiphenyl	88.2			59-144	%REC	1	2/24/2008
Surr: Tetrachloro-m-xylene	78.4			56.9-130	%REC	1	2/24/2008
<b>CHLORINATED HERBICIDES</b>							
			Method: <b>SW8151</b>		Prep: SW3550 / 2/22/08		Analyst: <b>JLJ</b>
2,4,5-T	U		0.60	3.3	µg/Kg	1	2/24/2008
2,4,5-TP (Silvex)	U		0.50	3.3	µg/Kg	1	2/24/2008
2,4-D	U		1.0	6.6	µg/Kg	1	2/24/2008
2,4-DB	U		1.7	6.6	µg/Kg	1	2/24/2008
Dalapon	U		1.6	3.3	µg/Kg	1	2/24/2008
Dicamba	U		1.5	3.3	µg/Kg	1	2/24/2008
Dichlorprop	U		3.0	6.6	µg/Kg	1	2/24/2008
Dinoseb	U		0.50	3.3	µg/Kg	1	2/24/2008
MCPA	U		150	660	µg/Kg	1	2/24/2008
MCPP	U		140	660	µg/Kg	1	2/24/2008
Surr: DCAA	37.1			30-150	%REC	1	2/24/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

## e-Lab Analytical, Inc.

Date: February 29, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF  
 Sample ID: F14-SB-2 (13-15)  
 Collection Date: 2/15/2008 5:05:00 PM

Work Order: 0802326  
 Lab ID: 0802326-06  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	127			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	127			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	U		0.50	1.7	mg/Kg	1	2/22/2008
Surr: 2-Fluorobiphenyl	72.9			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	U		1.4	13.1	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/20/08		Analyst: <b>SA</b>
Aluminum	2,340		36	96.2	mg/Kg	100	2/21/2008
Antimony	U		0.13	0.481	mg/Kg	1	2/20/2008
Arsenic	2.71		0.12	0.481	mg/Kg	1	2/20/2008
Barium	30.0		0.067	0.481	mg/Kg	1	2/20/2008
Beryllium	0.147	J	0.029	0.481	mg/Kg	1	2/20/2008
Boron	4.88		0.38	2.40	mg/Kg	1	2/20/2008
Cadmium	U		0.029	0.481	mg/Kg	1	2/20/2008
Calcium	11,200		9.6	48.1	mg/Kg	1	2/20/2008
Chromium	3.05		0.067	0.481	mg/Kg	1	2/20/2008
Cobalt	0.952		0.016	0.481	mg/Kg	1	2/20/2008
Copper	0.911		0.038	0.481	mg/Kg	1	2/20/2008
Iron	2,790		4.2	48.1	mg/Kg	1	2/20/2008
Lead	2.30		0.087	0.481	mg/Kg	1	2/20/2008
Magnesium	1,770		2.5	48.1	mg/Kg	1	2/20/2008
Manganese	32.9		0.048	0.481	mg/Kg	1	2/20/2008
Molybdenum	0.119	J	0.096	0.481	mg/Kg	1	2/20/2008
Nickel	1.88		0.077	0.481	mg/Kg	1	2/20/2008
Potassium	809		2.5	48.1	mg/Kg	1	2/20/2008
Selenium	0.352	J	0.18	0.481	mg/Kg	1	2/20/2008
Silver	0.100	J	0.019	0.481	mg/Kg	1	2/20/2008
Sodium	454		8.8	48.1	mg/Kg	1	2/20/2008
Strontium	43.7		0.096	0.481	mg/Kg	1	2/20/2008

Qualifiers: U - Analyzed for but Not Detected

S - Spike Recovery outside accepted recovery limits

J - Analyte detected below quantitation limits

P - Dual Column results RPD &gt; 40%

B - Analyte detected in the associated Method Blank

E - Value above quantitation range

\* - Value exceeds Maximum Contaminant Level

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-2 (13-15)  
**Collection Date:** 2/15/2008 5:05:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-06  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	U		0.048	0.481	mg/Kg	1	2/20/2008
<b>Tin</b>	<b>1.09</b>	J	<b>0.38</b>	<b>2.40</b>	<b>mg/Kg</b>	1	2/20/2008
<b>Titanium</b>	<b>65.6</b>		<b>0.067</b>	<b>0.481</b>	<b>mg/Kg</b>	1	2/20/2008
<b>Vanadium</b>	<b>12.3</b>		<b>0.054</b>	<b>0.481</b>	<b>mg/Kg</b>	1	2/20/2008
<b>Zinc</b>	<b>5.85</b>		<b>0.096</b>	<b>0.481</b>	<b>mg/Kg</b>	1	2/20/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>
Lithium	U		4.7	4.67	mg/Kg	1	2/27/2008
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>		Analyst: <b>RKG</b>		
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/26/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/26/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/26/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/26/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/26/2008
Acetone	U		2.0	25	µg/Kg	1	2/26/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Bromoform	U		0.50	10	µg/Kg	1	2/26/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/26/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/26/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/26/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/26/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/26/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/26/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/26/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-2 (13-15)  
**Collection Date:** 2/15/2008 5:05:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-06  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Dichloromethane	U		3.0	10	µg/Kg	1	2/26/2008
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/26/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/26/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/26/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/26/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/26/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/26/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/26/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/26/2008
Surr: 1,2-Dichloroethane-d4	102			70-128	%REC	1	2/26/2008
Surr: 4-Bromofluorobenzene	103			73-126	%REC	1	2/26/2008
Surr: Dibromofluoromethane	99.3			71-128	%REC	1	2/26/2008
Surr: Toluene-d8	101			73-127	%REC	1	2/26/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/21/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/21/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
Percent Moisture	2.85		0.010	0.0100	wt%	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>		Prep: E365.3 / 2/26/08		Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.13	0.130	mg/Kg	1	2/26/2008
Phosphorus, Total (As P)	13.8		0.20	0.500	mg/Kg	1	2/26/2008
Phosphorus, Total Orthophosphate (As P)	U		0.13	0.130	mg/Kg	1	2/26/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SiD</b>				Analyst: <b>IGF</b>
Silica, Dissolved (as SiO2)	8.71		0.020	0.100	mg/kg	1	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

## e-Lab Analytical, Inc.

Date: February 29, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF  
 Sample ID: F14-SB-2 (28-30)  
 Collection Date: 2/15/2008 7:00:00 PM

Work Order: 0802326  
 Lab ID: 0802326-07  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	107			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	106			55-137	%REC	1	2/26/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	2.19	J	1.4	13.3	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/20/08		Analyst: <b>SA</b>
Aluminum	4,260		35	95.2	mg/Kg	100	2/21/2008
Antimony	0.193	J	0.13	0.476	mg/Kg	1	2/20/2008
Arsenic	2.26		0.12	0.476	mg/Kg	1	2/20/2008
Barium	94.4		0.067	0.476	mg/Kg	1	2/20/2008
Beryllium	0.255	J	0.029	0.476	mg/Kg	1	2/20/2008
Boron	5.53		0.38	2.38	mg/Kg	1	2/20/2008
Cadmium	0.0637	J	0.029	0.476	mg/Kg	1	2/20/2008
Calcium	39,400		950	4,760	mg/Kg	100	2/21/2008
Chromium	5.22		0.067	0.476	mg/Kg	1	2/20/2008
Cobalt	1.88		0.016	0.476	mg/Kg	1	2/20/2008
Copper	2.00		0.038	0.476	mg/Kg	1	2/20/2008
Iron	4,530		4.2	47.6	mg/Kg	1	2/20/2008
Lead	3.81		0.086	0.476	mg/Kg	1	2/20/2008
Magnesium	2,940		2.5	47.6	mg/Kg	1	2/20/2008
Manganese	85.8		0.048	0.476	mg/Kg	1	2/20/2008
Molybdenum	0.358	J	0.095	0.476	mg/Kg	1	2/20/2008
Nickel	3.07		0.076	0.476	mg/Kg	1	2/20/2008
Potassium	1,220		2.5	47.6	mg/Kg	1	2/20/2008
Selenium	0.525		0.18	0.476	mg/Kg	1	2/20/2008
Silver	0.116	J	0.019	0.476	mg/Kg	1	2/20/2008
Sodium	367		8.7	47.6	mg/Kg	1	2/20/2008
Strontium	91.8		0.095	0.476	mg/Kg	1	2/20/2008
Thallium	0.0921	J	0.048	0.476	mg/Kg	1	2/20/2008
Tin	1.08	J	0.38	2.38	mg/Kg	1	2/20/2008
Titanium	113		0.067	0.476	mg/Kg	1	2/20/2008
Vanadium	12.3		0.053	0.476	mg/Kg	1	2/20/2008

Qualifiers: U - Analyzed for but Not Detected

S - Spike Recovery outside accepted recovery limits

J - Analyte detected below quantitation limits

P - Dual Column results RPD &gt; 40%

B - Analyte detected in the associated Method Blank

E - Value above quantitation range

\* - Value exceeds Maximum Contaminant Level

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-2 (28-30)  
**Collection Date:** 2/15/2008 7:00:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-07  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Zinc	11.5		0.095	0.476	mg/Kg	1	2/20/2008
<b>ICP METALS, TOTAL - SW6020A</b>		Method: SW6020		Prep: SW3050A / 2/22/08		Analyst: SA	
Lithium	5.05		4.9	4.85	mg/Kg	1	2/27/2008
<b>LOW-LEVEL TCL SEMIVOLATILE ORGANICS</b>		Method: SW8270		Prep: SW3541 / 2/19/08		Analyst: LG	
1,1'-Biphenyl	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,5-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,6-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dimethylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dinitrophenol	U		30	30	µg/Kg	1	2/20/2008
2,4-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2,6-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chloronaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylnaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3&4-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3,3'-Dichlorobenzidine	U		6.6	6.6	µg/Kg	1	2/20/2008
3-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4,6-Dinitro-2-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Bromophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloro-3-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chlorophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Nitroaniline	U		30	30	µg/Kg	1	2/20/2008
4-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acetophenone	U		6.6	6.6	µg/Kg	1	2/20/2008
Anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Atrazine	U		6.6	6.6	µg/Kg	1	2/20/2008
Benz(a)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzaldehyde	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(a)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(b)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(g,h,i)perylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(k)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

## e-Lab Analytical, Inc.

Date: February 29, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF  
 Sample ID: F14-SB-2 (28-30)  
 Collection Date: 2/15/2008 7:00:00 PM

Work Order: 0802326  
 Lab ID: 0802326-07  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Bis(2-chloroethoxy)methane	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroethyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroisopropyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Bis(2-ethylhexyl)phthalate</b>	<b>9.1</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Butyl benzyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Caprolactam	U		6.6	6.6	µg/Kg	1	2/20/2008
Carbazole	U		6.6	6.6	µg/Kg	1	2/20/2008
Chrysene	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Di-n-butyl phthalate</b>	<b>6.9</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Di-n-octyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenz(a,h)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenzofuran	U		6.6	6.6	µg/Kg	1	2/20/2008
Diethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dimethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluorene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobutadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorocyclopentadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachloroethane	U		6.6	6.6	µg/Kg	1	2/20/2008
Indeno(1,2,3-cd)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Isophorone	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodi-n-propylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodiphenylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
Naphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
Nitrobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Pentachlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenanthrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Surr: 2,4,6-Tribromophenol	72.2			36-126	%REC	1	2/20/2008
Surr: 2-Fluorobiphenyl	71.1			43-125	%REC	1	2/20/2008
Surr: 2-Fluorophenol	77.5			37-125	%REC	1	2/20/2008
Surr: 4-Terphenyl-d14	97.0			32-125	%REC	1	2/20/2008
Surr: Nitrobenzene-d5	69.8			37-125	%REC	1	2/20/2008
Surr: Phenol-d6	76.3			40-125	%REC	1	2/20/2008
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>				Analyst: <b>RKG</b>
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/26/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1,2-Trichloro-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/26/2008

Qualifiers: U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-2 (28-30)  
**Collection Date:** 2/15/2008 7:00:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-07  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/26/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/26/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/26/2008
Acetone	U		2.0	25	µg/Kg	1	2/26/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Bromoform	U		0.50	10	µg/Kg	1	2/26/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/26/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/26/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/26/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/26/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/26/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/26/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/26/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/26/2008
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Dichloromethane	U		3.0	10	µg/Kg	1	2/26/2008
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/26/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/26/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/26/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/26/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/26/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/26/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**
**Date:** February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-2 (28-30)  
**Collection Date:** 2/15/2008 7:00:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-07  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/26/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/26/2008
Surr: 1,2-Dichloroethane-d4	89.6			70-128	%REC	1	2/26/2008
Surr: 4-Bromofluorobenzene	105			73-126	%REC	1	2/26/2008
Surr: Dibromofluoromethane	97.5			71-128	%REC	1	2/26/2008
Surr: Toluene-d8	106			73-127	%REC	1	2/26/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/21/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/21/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
Percent Moisture	2.41		0.010	0.0100	wt%	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>				Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.65	0.650	mg/Kg	5	2/26/2008
Phosphorus, Total (As P)	117		1.0	2.50	mg/Kg	5	2/26/2008
Phosphorus, Total Orthophosphate (As P)	U		0.65	0.650	mg/Kg	5	2/26/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SID</b>				Analyst: <b>IGF</b>
Silica, Dissolved (as SiO2)	16.9		0.020	0.100	mg/kg	1	2/26/2008

**Qualifiers:**

U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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## e-Lab Analytical, Inc.

Date: February 29, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF  
 Sample ID: F14-SB-5 (0-2)  
 Collection Date: 2/15/2008 1:00:00 PM

Work Order: 0802326  
 Lab ID: 0802326-08  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	122			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	122			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	U		0.50	1.7	mg/Kg	1	2/22/2008
Surr: 2-Fluorobiphenyl	83.4			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	1.97	J	1.4	13.1	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/20/08		Analyst: <b>SA</b>
Aluminum	3,770		34	91.7	mg/Kg	100	2/21/2008
Antimony	U		0.13	0.459	mg/Kg	1	2/20/2008
Arsenic	2.27		0.12	0.459	mg/Kg	1	2/20/2008
Barium	79.3		0.064	0.459	mg/Kg	1	2/20/2008
Beryllium	0.225	J	0.028	0.459	mg/Kg	1	2/20/2008
Boron	3.08		0.37	2.29	mg/Kg	1	2/20/2008
Cadmium	0.0415	J	0.028	0.459	mg/Kg	1	2/20/2008
Calcium	38,800		920	4,590	mg/Kg	100	2/21/2008
Chromium	3.44		0.064	0.459	mg/Kg	1	2/20/2008
Cobalt	1.64		0.016	0.459	mg/Kg	1	2/20/2008
Copper	1.80		0.037	0.459	mg/Kg	1	2/20/2008
Iron	4,030		4.0	45.9	mg/Kg	1	2/20/2008
Lead	3.23		0.083	0.459	mg/Kg	1	2/20/2008
Magnesium	2,320		2.4	45.9	mg/Kg	1	2/20/2008
Manganese	75.1		0.046	0.459	mg/Kg	1	2/20/2008
Molybdenum	0.212	J	0.092	0.459	mg/Kg	1	2/20/2008
Nickel	2.70		0.073	0.459	mg/Kg	1	2/20/2008
Potassium	972		2.4	45.9	mg/Kg	1	2/20/2008
Selenium	0.576		0.17	0.459	mg/Kg	1	2/20/2008
Silver	0.105	J	0.018	0.459	mg/Kg	1	2/20/2008
Sodium	42.6	J	8.3	45.9	mg/Kg	1	2/20/2008
Strontium	91.1		0.092	0.459	mg/Kg	1	2/20/2008

Qualifiers: U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-5 (0-2)  
**Collection Date:** 2/15/2008 1:00:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-08  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	0.0529	J	0.046	0.459	mg/Kg	1	2/20/2008
Tin	1.00	J	0.37	2.29	mg/Kg	1	2/20/2008
Titanium	97.9		0.064	0.459	mg/Kg	1	2/20/2008
Vanadium	12.1		0.051	0.459	mg/Kg	1	2/20/2008
Zinc	10.7		0.092	0.459	mg/Kg	1	2/20/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>
Lithium	U		4.8	4.76	mg/Kg	1	2/27/2008
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>		Analyst: <b>RKG</b>		
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/26/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/26/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/26/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/26/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/26/2008
Acetone	U		2.0	25	µg/Kg	1	2/26/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Bromoform	U		0.50	10	µg/Kg	1	2/26/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/26/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/26/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/26/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/26/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/26/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/26/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/26/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-5 (0-2)  
**Collection Date:** 2/15/2008 1:00:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-08  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Dichloromethane	U		3.0	10	µg/Kg	1	2/26/2008
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/26/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/26/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/26/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/26/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/26/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/26/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/26/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/26/2008
Surr: 1,2-Dichloroethane-d4	101			70-128	%REC	1	2/26/2008
Surr: 4-Bromofluorobenzene	102			73-126	%REC	1	2/26/2008
Surr: Dibromofluoromethane	99.7			71-128	%REC	1	2/26/2008
Surr: Toluene-d8	99.7			73-127	%REC	1	2/26/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>			Analyst: <b>RPM</b>	
Cyanide	U		0.60	2.00	mg/Kg	1	2/25/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/25/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>			Analyst: <b>TL</b>	
Percent Moisture	2.22		0.010	0.0100	wt%	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>			Analyst: <b>DM</b>	
Phosphorus, Dissolved (As P)	U		0.65	0.650	mg/Kg	5	2/26/2008
Phosphorus, Total (As P)	61.2		1.0	2.50	mg/Kg	5	2/26/2008
Phosphorus, Total Orthophosphate (As P)	U		0.65	0.650	mg/Kg	5	2/26/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SiD</b>			Analyst: <b>IGF</b>	
Silica, Dissolved (as SiO2)	17.8		0.020	0.100	mg/kg	1	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-5 (13-15)  
**Collection Date:** 2/15/2008 1:10:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-09  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>MISCELLANEOUS PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
alpha-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
gamma-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
<b>ORGANOCHLORINE PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
4,4'-DDD	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDE	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDT	U		0.23	3.3	µg/Kg	1	2/24/2008
Aldrin	U		0.20	1.7	µg/Kg	1	2/24/2008
alpha-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
beta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Chlordane	U		3.0	17	µg/Kg	1	2/24/2008
delta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Dieldrin	U		0.20	3.3	µg/Kg	1	2/24/2008
Endosulfan I	U		0.20	1.7	µg/Kg	1	2/24/2008
Endosulfan II	U		0.30	3.3	µg/Kg	1	2/24/2008
Endosulfan sulfate	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin	U		0.22	3.3	µg/Kg	1	2/24/2008
Endrin aldehyde	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin ketone	U		0.25	3.3	µg/Kg	1	2/24/2008
gamma-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor epoxide	U		0.20	1.7	µg/Kg	1	2/24/2008
Methoxychlor	U		1.7	17	µg/Kg	1	2/24/2008
Toxaphene	U		5.8	17	µg/Kg	1	2/24/2008
Surr: Decachlorobiphenyl	91.2			59-144	%REC	1	2/24/2008
Surr: Tetrachloro-m-xylene	80.9			56.9-130	%REC	1	2/24/2008
<b>CHLORINATED HERBICIDES</b>							
			Method: <b>SW8151</b>		Prep: SW3550 / 2/22/08		Analyst: <b>JLJ</b>
2,4,5-T	U		0.60	3.3	µg/Kg	1	2/24/2008
2,4,5-TP (Silvex)	U		0.50	3.3	µg/Kg	1	2/24/2008
2,4-D	U		1.0	6.6	µg/Kg	1	2/24/2008
2,4-DB	U		1.7	6.6	µg/Kg	1	2/24/2008
Dalapon	U		1.6	3.3	µg/Kg	1	2/24/2008
Dicamba	U		1.5	3.3	µg/Kg	1	2/24/2008
Dichlorprop	U		3.0	6.6	µg/Kg	1	2/24/2008
Dinoseb	U		0.50	3.3	µg/Kg	1	2/24/2008
MCPA	U		150	660	µg/Kg	1	2/24/2008
MCPP	U		140	660	µg/Kg	1	2/24/2008
Surr: DCAA	43.4			30-150	%REC	1	2/24/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time



# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-5 (13-15)  
**Collection Date:** 2/15/2008 1:10:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-09  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	110			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	109			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	U		0.50	1.7	mg/Kg	1	2/22/2008
Surr: 2-Fluorobiphenyl	73.2			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	U		1.4	13.2	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/20/08		Analyst: <b>SA</b>
Aluminum	2,370		35	94.3	mg/Kg	100	2/21/2008
Antimony	U		0.13	0.472	mg/Kg	1	2/20/2008
Arsenic	1.57		0.12	0.472	mg/Kg	1	2/20/2008
Barium	24.8		0.066	0.472	mg/Kg	1	2/20/2008
Beryllium	0.145	J	0.028	0.472	mg/Kg	1	2/20/2008
Boron	4.42		0.38	2.36	mg/Kg	1	2/20/2008
Cadmium	U		0.028	0.472	mg/Kg	1	2/20/2008
Calcium	11,900		9.4	47.2	mg/Kg	1	2/20/2008
Chromium	2.76		0.066	0.472	mg/Kg	1	2/20/2008
Cobalt	0.918		0.016	0.472	mg/Kg	1	2/20/2008
Copper	0.913		0.038	0.472	mg/Kg	1	2/20/2008
Iron	2,620		4.2	47.2	mg/Kg	1	2/20/2008
Lead	2.25		0.085	0.472	mg/Kg	1	2/20/2008
Magnesium	1,460		2.5	47.2	mg/Kg	1	2/20/2008
Manganese	36.2		0.047	0.472	mg/Kg	1	2/20/2008
Molybdenum	0.168	J	0.094	0.472	mg/Kg	1	2/20/2008
Nickel	1.79		0.075	0.472	mg/Kg	1	2/20/2008
Potassium	740		2.5	47.2	mg/Kg	1	2/20/2008
Selenium	0.357	J	0.18	0.472	mg/Kg	1	2/20/2008
Silver	0.0999	J	0.019	0.472	mg/Kg	1	2/20/2008
Sodium	202		8.6	47.2	mg/Kg	1	2/20/2008
Strontium	26.6		0.094	0.472	mg/Kg	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-5 (13-15)  
**Collection Date:** 2/15/2008 1:10:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-09  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	U		0.047	0.472	mg/Kg	1	2/20/2008
<b>Tin</b>	<b>1.06</b>	J	<b>0.38</b>	<b>2.36</b>	<b>mg/Kg</b>	1	2/20/2008
<b>Titanium</b>	<b>67.8</b>		<b>0.066</b>	<b>0.472</b>	<b>mg/Kg</b>	1	2/20/2008
<b>Vanadium</b>	<b>7.98</b>		<b>0.053</b>	<b>0.472</b>	<b>mg/Kg</b>	1	2/20/2008
<b>Zinc</b>	<b>5.84</b>		<b>0.094</b>	<b>0.472</b>	<b>mg/Kg</b>	1	2/20/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>
Lithium	U		4.8	4.81	mg/Kg	1	2/27/2008
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>		Analyst: <b>RKG</b>		
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/26/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/26/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/26/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/26/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/26/2008
Acetone	U		2.0	25	µg/Kg	1	2/26/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Bromoform	U		0.50	10	µg/Kg	1	2/26/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/26/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/26/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/26/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/26/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/26/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/26/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/26/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-5 (13-15)  
**Collection Date:** 2/15/2008 1:10:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-09  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Dichloromethane	U		3.0	10	µg/Kg	1	2/26/2008
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/26/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/26/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/26/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/26/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/26/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/26/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/26/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/26/2008
Surr: 1,2-Dichloroethane-d4	105			70-128	%REC	1	2/26/2008
Surr: 4-Bromofluorobenzene	102			73-126	%REC	1	2/26/2008
Surr: Dibromofluoromethane	102			71-128	%REC	1	2/26/2008
Surr: Toluene-d8	97.5			73-127	%REC	1	2/26/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/25/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/25/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
Percent Moisture	<b>5.92</b>		<b>0.010</b>	<b>0.0100</b>	wt%	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>			Prep: E365.3 / 2/26/08	Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.13	0.130	mg/Kg	1	2/26/2008
<b>Phosphorus, Total (As P)</b>	<b>17.6</b>		<b>0.20</b>	<b>0.500</b>	mg/Kg	1	2/26/2008
Phosphorus, Total Orthophosphate (As P)	U		0.13	0.130	mg/Kg	1	2/26/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SiD</b>				Analyst: <b>IGF</b>
Silica, Dissolved (as SiO2)	<b>13.0</b>		<b>0.020</b>	<b>0.100</b>	mg/kg	1	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

## e-Lab Analytical, Inc.

Date: February 29, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF  
 Sample ID: F14-SB-5 (28-30)  
 Collection Date: 2/15/2008 2:17:00 PM

Work Order: 0802326  
 Lab ID: 0802326-10  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	123			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	120			55-137	%REC	1	2/26/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	U		1.4	13.2	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/20/08		Analyst: <b>SA</b>
Aluminum	6,420		36	97.1	mg/Kg	100	2/21/2008
Antimony	U		0.14	0.485	mg/Kg	1	2/20/2008
Arsenic	4.01		0.13	0.485	mg/Kg	1	2/20/2008
Barium	28.7		0.068	0.485	mg/Kg	1	2/20/2008
Beryllium	0.354	J	0.029	0.485	mg/Kg	1	2/20/2008
Boron	6.82		0.39	2.43	mg/Kg	1	2/20/2008
Cadmium	0.0637	J	0.029	0.485	mg/Kg	1	2/20/2008
Calcium	49,300		970	4,850	mg/Kg	100	2/21/2008
Chromium	5.34		0.068	0.485	mg/Kg	1	2/20/2008
Cobalt	2.20		0.017	0.485	mg/Kg	1	2/20/2008
Copper	2.38		0.039	0.485	mg/Kg	1	2/20/2008
Iron	5,640		4.3	48.5	mg/Kg	1	2/20/2008
Lead	4.12		0.087	0.485	mg/Kg	1	2/20/2008
Magnesium	5,260		2.5	48.5	mg/Kg	1	2/20/2008
Manganese	84.1		0.049	0.485	mg/Kg	1	2/20/2008
Molybdenum	0.124	J	0.097	0.485	mg/Kg	1	2/20/2008
Nickel	4.68		0.078	0.485	mg/Kg	1	2/20/2008
Potassium	2,510		2.5	48.5	mg/Kg	1	2/20/2008
Selenium	0.583		0.18	0.485	mg/Kg	1	2/20/2008
Silver	0.103	J	0.019	0.485	mg/Kg	1	2/20/2008
Sodium	417		8.8	48.5	mg/Kg	1	2/20/2008
Strontium	110		0.097	0.485	mg/Kg	1	2/20/2008
Thallium	0.0667	J	0.049	0.485	mg/Kg	1	2/20/2008
Tin	1.07	J	0.39	2.43	mg/Kg	1	2/20/2008
Titanium	100		0.068	0.485	mg/Kg	1	2/20/2008
Vanadium	18.0		0.054	0.485	mg/Kg	1	2/20/2008

Qualifiers: U - Analyzed for but Not Detected

S - Spike Recovery outside accepted recovery limits

J - Analyte detected below quantitation limits

P - Dual Column results RPD &gt; 40%

B - Analyte detected in the associated Method Blank

E - Value above quantitation range

\* - Value exceeds Maximum Contaminant Level

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**
**Date:** February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-5 (28-30)  
**Collection Date:** 2/15/2008 2:17:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-10  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>Zinc</b>	<b>14.0</b>		<b>0.097</b>	<b>0.485</b>	<b>mg/Kg</b>	<b>1</b>	<b>2/20/2008</b>
<b>ICP METALS, TOTAL - SW6020A</b>		Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>	
<b>Lithium</b>	<b>15.6</b>		<b>4.5</b>	<b>4.50</b>	<b>mg/Kg</b>	<b>1</b>	<b>2/27/2008</b>
<b>LOW-LEVEL TCL SEMIVOLATILE ORGANICS</b>		Method: <b>SW8270</b>		Prep: SW3541 / 2/19/08		Analyst: <b>LG</b>	
1,1'-Biphenyl	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,5-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,6-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dimethylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dinitrophenol	U		30	30	µg/Kg	1	2/20/2008
2,4-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2,6-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chloronaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylnaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3&4-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3,3'-Dichlorobenzidine	U		6.6	6.6	µg/Kg	1	2/20/2008
3-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4,6-Dinitro-2-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Bromophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloro-3-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chlorophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Nitroaniline	U		30	30	µg/Kg	1	2/20/2008
4-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acetophenone	U		6.6	6.6	µg/Kg	1	2/20/2008
Anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Atrazine	U		6.6	6.6	µg/Kg	1	2/20/2008
Benz(a)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzaldehyde	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(a)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(b)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(g,h,i)perylene	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Benzo(k)fluoranthene</b>	<b>6.6</b>	<b>J</b>	<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	<b>1</b>	<b>2/20/2008</b>

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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## e-Lab Analytical, Inc.

Date: February 29, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF  
 Sample ID: F14-SB-5 (28-30)  
 Collection Date: 2/15/2008 2:17:00 PM

Work Order: 0802326  
 Lab ID: 0802326-10  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Bis(2-chloroethoxy)methane	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroethyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroisopropyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Bis(2-ethylhexyl)phthalate</b>	<b>19</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Butyl benzyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Caprolactam	U		6.6	6.6	µg/Kg	1	2/20/2008
Carbazole	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Chrysene</b>	<b>6.7</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
<b>Di-n-butyl phthalate</b>	<b>12</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Di-n-octyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenz(a,h)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenzofuran	U		6.6	6.6	µg/Kg	1	2/20/2008
Diethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dimethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluorene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobutadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorocyclopentadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachloroethane	U		6.6	6.6	µg/Kg	1	2/20/2008
Indeno(1,2,3-cd)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Isophorone	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodi-n-propylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodiphenylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
Naphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
Nitrobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Pentachlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenanthrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Surr: 2,4,6-Tribromophenol	69.0			36-126	%REC	1	2/20/2008
Surr: 2-Fluorobiphenyl	76.2			43-125	%REC	1	2/20/2008
Surr: 2-Fluorophenol	84.0			37-125	%REC	1	2/20/2008
Surr: 4-Terphenyl-d14	89.3			32-125	%REC	1	2/20/2008
Surr: Nitrobenzene-d5	71.2			37-125	%REC	1	2/20/2008
Surr: Phenol-d6	83.3			40-125	%REC	1	2/20/2008
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>				Analyst: <b>RKG</b>
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/26/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1,2-Trichloro-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/26/2008

Qualifiers: U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-5 (28-30)  
**Collection Date:** 2/15/2008 2:17:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-10  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/26/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/26/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/26/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/26/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/26/2008
Acetone	U		2.0	25	µg/Kg	1	2/26/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Bromoform	U		0.50	10	µg/Kg	1	2/26/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/26/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/26/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/26/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/26/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/26/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/26/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/26/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/26/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/26/2008
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/26/2008
Dichloromethane	U		3.0	10	µg/Kg	1	2/26/2008
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/26/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/26/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/26/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/26/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/26/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/26/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/26/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 29, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF  
**Sample ID:** F14-SB-5 (28-30)  
**Collection Date:** 2/15/2008 2:17:00 PM

**Work Order:** 0802326  
**Lab ID:** 0802326-10  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/26/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/26/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/26/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/26/2008
Surr: 1,2-Dichloroethane-d4	99.6			70-128	%REC	1	2/26/2008
Surr: 4-Bromofluorobenzene	99.7			73-126	%REC	1	2/26/2008
Surr: Dibromofluoromethane	99.2			71-128	%REC	1	2/26/2008
Surr: Toluene-d8	99.6			73-127	%REC	1	2/26/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/21/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/21/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
Percent Moisture	<b>13.4</b>		<b>0.010</b>	<b>0.0100</b>	wt%	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>		Prep: E365.3 / 2/26/08		Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.65	0.650	mg/Kg	5	2/26/2008
<b>Phosphorus, Total (As P)</b>	<b>123</b>		<b>1.0</b>	<b>2.50</b>	<b>mg/Kg</b>	5	2/26/2008
Phosphorus, Total Orthophosphate (As P)	U		0.65	0.650	mg/Kg	5	2/26/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SID</b>				Analyst: <b>IGF</b>
Silica, Dissolved (as SiO2)	<b>30.8</b>		<b>0.040</b>	<b>0.200</b>	mg/kg	2	2/26/2008

## Qualifiers:

U - Analyzed for but Not Detected  
J - Analyte detected below quantitation limits  
B - Analyte detected in the associated Method Blank  
\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits  
P - Dual Column results RPD > 40%  
E - Value above quantitation range  
H - Analyzed outside of Hold Time



## e-Lab Analytical, Inc.

Date: Feb 29 2008

CLIENT: Malcolm Pirnie, Inc.

## QC BATCH REPORT

Work Order: 0802326

Project: Oro Grande LF

Batch ID: 28324

Instrument ID ECD\_1

Method: SW8081

MBLK		Sample ID: PBLKS1-080220				Units: µg/Kg		Analysis Date: 02/24/08 12:45		
Client ID:		Run ID: ECD_1_080223D				SeqNo: 1335513		Prep Date: 2/20/2008		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	U	3.3								
4,4'-DDE	U	3.3								
4,4'-DDT	U	3.3								
Aldrin	U	1.7								
alpha-BHC	U	1.7								
beta-BHC	U	1.7								
Chlordane	U	17								
delta-BHC	U	1.7								
Dieldrin	U	3.3								
Endosulfan I	U	1.7								
Endosulfan II	U	3.3								
Endosulfan sulfate	U	3.3								
Endrin	U	3.3								
Endrin aldehyde	U	3.3								
Endrin ketone	U	3.3								
gamma-BHC	U	1.7								
Heptachlor	U	1.7								
Heptachlor epoxide	U	1.7								
Methoxychlor	U	17								
Toxaphene	U	17								
Surr: Decachlorobiphenyl	6.233	3.3	6.667	0	93.5	59-144	0			
Surr: Tetrachloro-m-xylene	5.783	1.6	6.667	0	86.7	56.9-130	0			

MBLK		Sample ID: PBLKS1-080220				Units: µg/Kg		Analysis Date: 02/24/08 12:45		
Client ID:		Run ID: ECD_1_080223D				SeqNo: 1335528		Prep Date: 2/20/2008		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	U	1.7								
gamma-Chlordane	U	1.7								

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is &gt; 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference &gt; 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 1 of 37

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

## QC BATCH REPORT

Batch ID: **28324** Instrument ID **ECD\_1** Method: **SW8081**

LCS		Sample ID: <b>PLCSS1-080220</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 13:19</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335514</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	15.86	3.3	16.67	0	95.1	53-138	0			
4,4'-DDE	15.64	3.3	16.67	0	93.8	57-136	0			
4,4'-DDT	16.11	3.3	16.67	0	96.7	53-139	0			
Aldrin	6.995	1.7	8.333	0	83.9	52-130	0			
alpha-BHC	7.352	1.7	8.333	0	88.2	52-130	0			
beta-BHC	7.426	1.7	8.333	0	89.1	62-130	0			
delta-BHC	7.077	1.7	8.333	0	84.9	41-137	0			
Dieldrin	15.4	3.3	16.67	0	92.4	54-138	0			
Endosulfan I	7.705	1.7	8.333	0	92.5	55-132	0			
Endosulfan II	15.06	3.3	16.67	0	90.3	59-134	0			
Endosulfan sulfate	16.07	3.3	16.67	0	96.4	54-141	0			
Endrin	19.29	3.3	16.67	0	116	60-157	0			
Endrin aldehyde	13.7	3.3	16.67	0	82.2	56-146	0			
Endrin ketone	16.81	3.3	16.67	0	101	56-153	0			
gamma-BHC	7.702	1.7	8.333	0	92.4	52-133	0			
Heptachlor	7.62	1.7	8.333	0	91.4	54-134	0			
Heptachlor epoxide	7.397	1.7	8.333	0	88.8	58-130	0			
Methoxychlor	85.99	17	83.33	0	103	60-140	0			
<i>Surr: Decachlorobiphenyl</i>	6.944	3.3	6.667	0	104	60-150	0			
<i>Surr: Tetrachloro-m-xylene</i>	6.044	1.6	6.667	0	90.7	60-135	0			

LCS		Sample ID: <b>PLCSS1-080220</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 13:19</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335529</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	7.175	1.7	8.333	0	86.1	55-132	0			
gamma-Chlordane	7.337	1.7	8.333	0	88	60-129	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

## QC BATCH REPORT

Batch ID: **28324** Instrument ID **ECD\_1** Method: **SW8081**

MS Sample ID: <b>0802304-01DMS</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/24/08 16:10</b>			
Client ID:		Run ID: <b>ECD_1_080223D</b>			SeqNo: <b>1335519</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	15	3.3	16.64	0	90.1	53-138	0			
4,4'-DDE	14.96	3.3	16.64	0	89.9	57-136	0			
4,4'-DDT	14.92	3.3	16.64	0	89.6	53-139	0			
Aldrin	6.584	1.7	8.319	0	79.1	52-130	0			
alpha-BHC	7.075	1.7	8.319	0	85	52-130	0			
beta-BHC	7.523	1.7	8.319	0	90.4	62-130	0			
delta-BHC	7.593	1.7	8.319	0	91.3	41-137	0			
Dieldrin	14.83	3.3	16.64	0	89.1	54-138	0			
Endosulfan I	7.343	1.7	8.319	0	88.3	55-132	0			
Endosulfan II	14.5	3.3	16.64	0	87.2	59-134	0			
Endosulfan sulfate	16.35	3.3	16.64	0	98.2	54-141	0			
Endrin	18.47	3.3	16.64	0	111	60-157	0			
Endrin aldehyde	15.69	3.3	16.64	0	94.3	56-146	0			
Endrin ketone	16.93	3.3	16.64	0	102	56-153	0			
gamma-BHC	7.268	1.7	8.319	0	87.4	52-133	0			
Heptachlor	7.272	1.7	8.319	0	87.4	54-134	0			
Heptachlor epoxide	6.87	1.7	8.319	0	82.6	58-130	0			
Methoxychlor	85.56	17	83.19	0	103	60-140	0			
Surr: Decachlorobiphenyl	6.142	3.3	6.656	0	92.3	60-150	0			
Surr: Tetrachloro-m-xylene	5.499	1.6	6.656	0	82.6	60-135	0			

MS Sample ID: <b>0802304-01DMS</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/24/08 16:10</b>			
Client ID:		Run ID: <b>ECD_1_080223D</b>			SeqNo: <b>1335534</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	6.877	1.7	8.319	0	82.7	55-132	0			
gamma-Chlordane	7.267	1.7	8.319	0	87.3	60-129	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

CLIENT: Malcolm Pirnie, Inc.  
Work Order: 0802326  
Project: Oro Grande LF

## QC BATCH REPORT

Batch ID: **28324** Instrument ID **ECD\_1** Method: **SW8081**

MSD		Sample ID: <b>0802304-01DMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 16:44</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335520</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	14.45	3.3	16.66	0	86.8	53-138	15	3.69	30	
4,4'-DDE	14.54	3.3	16.66	0	87.3	57-136	14.96	2.79	30	
4,4'-DDT	14.49	3.3	16.66	0	87	53-139	14.92	2.9	30	
Aldrin	6.272	1.7	8.331	0	75.3	52-130	6.584	4.85	30	
alpha-BHC	6.759	1.7	8.331	0	81.1	52-130	7.075	4.56	30	
beta-BHC	7.186	1.7	8.331	0	86.3	62-130	7.523	4.59	30	
delta-BHC	7.229	1.7	8.331	0	86.8	41-137	7.593	4.91	30	
Dieldrin	14.31	3.3	16.66	0	85.9	54-138	14.83	3.59	30	
Endosulfan I	7.109	1.7	8.331	0	85.3	55-132	7.343	3.24	30	
Endosulfan II	14	3.3	16.66	0	84	59-134	14.5	3.55	30	
Endosulfan sulfate	15.64	3.3	16.66	0	93.9	54-141	16.35	4.41	30	
Endrin	17.77	3.3	16.66	0	107	60-157	18.47	3.88	30	
Endrin aldehyde	15.22	3.3	16.66	0	91.3	56-146	15.69	3.1	30	
Endrin ketone	16.55	3.3	16.66	0	99.3	56-153	16.93	2.29	30	
gamma-BHC	6.934	1.7	8.331	0	83.2	52-133	7.268	4.7	30	
Heptachlor	6.941	1.7	8.331	0	83.3	54-134	7.272	4.65	30	
Heptachlor epoxide	6.668	1.7	8.331	0	80	58-130	6.87	2.98	30	
Methoxychlor	83.98	17	83.31	0	101	60-140	85.56	1.86	30	
Surr: Decachlorobiphenyl	6.005	3.3	6.664	0	90.1	60-150	6.142	2.25	30	
Surr: Tetrachloro-m-xylene	5.218	1.6	6.664	0	78.3	60-135	5.499	5.25	30	

MSD		Sample ID: <b>0802304-01DMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 16:44</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335535</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	6.624	1.7	8.331	0	79.5	55-132	6.877	3.75	30	
gamma-Chlordane	7.218	1.7	8.331	0	86.6	60-129	7.267	0.676	30	

The following samples were analyzed in this batch:

0802326-02B	0802326-04C	0802326-06C
0802326-09B		

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 4 of 37

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

# QC BATCH REPORT

Batch ID: **28327** Instrument ID **ECD\_7** Method: **SW8082**

MBLK		Sample ID: <b>PBLKS3-080220</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/26/08 11:31</b>		
Client ID:		Run ID: <b>ECD_7_080225B</b>				SeqNo: <b>1335821</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	U	17								
Aroclor 1221	U	17								
Aroclor 1232	U	17								
Aroclor 1242	U	17								
Aroclor 1248	U	17								
Aroclor 1254	U	17								
Aroclor 1260	U	17								
Surr: Decachlorobiphenyl	6.166	1.6	6.667	0	92.5	54-143	0			
Surr: Tetrachloro-m-xylene	6.252	1.6	6.667	0	93.8	55-137	0			

LCS		Sample ID: <b>PLCSS3-080220</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/26/08 12:05</b>		
Client ID:		Run ID: <b>ECD_7_080225B</b>				SeqNo: <b>1335822</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	148.6	17	166.7	0	89.2	53-135	0			
Aroclor 1260	160.2	17	166.7	0	96.1	54-137	0			
Surr: Decachlorobiphenyl	6.959	1.6	6.667	0	104	54-143	0			
Surr: Tetrachloro-m-xylene	6.763	1.6	6.667	0	101	55-137	0			

MS		Sample ID: <b>0802326-03CMS</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/26/08 14:22</b>		
Client ID: <b>F14-SB-3 (28-30)</b>		Run ID: <b>ECD_7_080225B</b>				SeqNo: <b>1335826</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	188.4	17	166.4	0	113	53-135	0			
Aroclor 1260	205.4	17	166.4	0	123	54-137	0			
Surr: Decachlorobiphenyl	8.15	1.6	6.658	0	122	54-143	0			
Surr: Tetrachloro-m-xylene	7.992	1.6	6.658	0	120	55-137	0			

MSD		Sample ID: <b>0802326-03CMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/26/08 14:56</b>		
Client ID: <b>F14-SB-3 (28-30)</b>		Run ID: <b>ECD_7_080225B</b>				SeqNo: <b>1335827</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	189.2	17	166.6	0	114	53-135	188.4	0.419	30	
Aroclor 1260	207	17	166.6	0	124	54-137	205.4	0.744	30	
Surr: Decachlorobiphenyl	8.166	1.6	6.664	0	123	54-143	8.15	0.186	30	
Surr: Tetrachloro-m-xylene	7.904	1.6	6.664	0	119	55-137	7.992	1.11	30	

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

## QC BATCH REPORT

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Batch ID: **28327** Instrument ID **ECD\_7** Method: **SW8082**

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The following samples were analyzed in this batch:

0802326-01B	0802326-02C	0802326-03C
0802326-04D	0802326-05C	0802326-06D
0802326-07C	0802326-08B	0802326-09C
0802326-10C		

---

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 6 of 37

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

## QC BATCH REPORT

Batch ID: **28371** Instrument ID **ECD\_5** Method: **SW8151**

**MBLK** Sample ID: **HBLKS1-080222** Units: **µg/Kg** Analysis Date: **02/24/08 12:20**

Client ID: Run ID: **ECD\_5\_080221C** SeqNo: **1335482** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	U	3.3								
2,4,5-TP (Silvex)	U	3.3								
2,4-D	U	6.6								
2,4-DB	U	6.6								
Dalapon	U	3.3								
Dicamba	U	3.3								
Dichlorprop	U	6.6								
Dinoseb	U	3.3								
MCPA	U	660								
MCP	U	660								
Surr: DCAA	187.5	6.6	166.7	0	113	30-150	0			

**LCS** Sample ID: **HLCSS1-080222** Units: **µg/Kg** Analysis Date: **02/24/08 12:57**

Client ID: Run ID: **ECD\_5\_080221C** SeqNo: **1335483** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	82.53	3.3	83.33	0	99	50-150	0			
2,4,5-TP (Silvex)	93.76	3.3	83.33	0	113	50-150	0			
2,4-D	68.06	6.6	83.33	0	81.7	40-150	0			
2,4-DB	86.73	6.6	83.33	0	104	40-150	0			
Dalapon	88.32	3.3	83.33	0	106	30-150	0			
Dicamba	77.37	3.3	83.33	0	92.8	40-150	0			
Dichlorprop	83.16	6.6	83.33	0	99.8	40-150	0			
Dinoseb	77.29	3.3	83.33	0	92.7	40-150	0			
MCPA	7051	660	8333	0	84.6	40-150	0			
MCP	7660	660	8333	0	91.9	40-150	0			
Surr: DCAA	176.7	6.6	166.7	0	106	50-150	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 7 of 37

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

# QC BATCH REPORT

Batch ID: **28371** Instrument ID **ECD\_5** Method: **SW8151**

MS		Sample ID: <b>0802304-01DMS</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 15:26</b>		
Client ID:		Run ID: <b>ECD_5_080221C</b>				SeqNo: <b>1335504</b>		Prep Date: <b>2/22/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	67.56	3.3	83.22	0	81.2	50-150	0			
2,4,5-TP (Silvex)	66.67	3.3	83.22	0	80.1	50-150	0			
2,4-D	53.91	6.6	83.22	0	64.8	40-150	0			
2,4-DB	77.8	6.6	83.22	0	93.5	40-150	0			
Dalapon	63.74	3.3	83.22	0	76.6	30-150	0			
Dicamba	55.25	3.3	83.22	0	66.4	40-150	0			
Dichlorprop	63.97	6.6	83.22	0	76.9	40-150	0			
Dinoseb	72	3.3	83.22	0	86.5	40-150	0			
MCPA	5862	660	8322	0	70.4	40-150	0			
MCP	4491	660	8322	0	54	40-150	0			P
Surr: DCAA	92.07	6.6	166.4	0	55.3	50-150	0			

MSD		Sample ID: <b>0802304-01DMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 16:03</b>		
Client ID:		Run ID: <b>ECD_5_080221C</b>				SeqNo: <b>1335505</b>		Prep Date: <b>2/22/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	67.98	3.3	83.31	0	81.6	50-150	67.56	0.626	30	
2,4,5-TP (Silvex)	65.83	3.3	83.31	0	79	50-150	66.67	1.26	30	
2,4-D	54.52	6.6	83.31	0	65.4	40-150	53.91	1.12	30	
2,4-DB	78.07	6.6	83.31	0	93.7	40-150	77.8	0.346	30	
Dalapon	62.65	3.3	83.31	0	75.2	30-150	63.74	1.73	30	
Dicamba	55.69	3.3	83.31	0	66.8	40-150	55.25	0.787	30	
Dichlorprop	63.76	6.6	83.31	0	76.5	40-150	63.97	0.332	30	
Dinoseb	72.28	3.3	83.31	0	86.8	40-150	72	0.387	30	
MCPA	6291	660	8331	0	75.5	40-150	5862	7.06	30	
MCP	4425	660	8331	0	53.1	40-150	4491	1.47	30	P
Surr: DCAA	89.52	6.6	166.6	0	53.7	50-150	92.07	2.8	30	

The following samples were analyzed in this batch:

0802326-02B	0802326-04C	0802326-06C
0802326-09B		

ND - Not Detected at the Reporting Limit	S - Spike Recovery outside accepted recovery limits	B - Analyte detected in assoc. Method Blank
J - Analyte detected below quantitation limits	R - RPD outside accepted recovery limits	U - Analyzed for but not detected
O - Referenced analyte value is > 4 times amount spiked	P - Dual Column results percent difference > 40%	E - Value above quantitation range



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

# QC BATCH REPORT

Batch ID: **28331** Instrument ID **FID-2** Method: **SW8015M**

<b>MBLK</b>	Sample ID: <b>FBLKS1-080221</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 0:05</b>		
Client ID:	Run ID: <b>FID-2_080221A</b>				SeqNo: <b>1336416</b>		Prep Date: <b>2/21/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	U	1.7								
<i>Surr: 2-Fluorobiphenyl</i>	3.292	0.10	3.333	0	98.8	70-130	0			

<b>LCS</b>	Sample ID: <b>FLCSS1-080221</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 0:55</b>		
Client ID:	Run ID: <b>FID-2_080221A</b>				SeqNo: <b>1336417</b>		Prep Date: <b>2/21/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	39.46	1.7	33.33	0	118	70-130	0			
<i>Surr: 2-Fluorobiphenyl</i>	3.922	0.10	3.333	0	118	70-130	0			

<b>MS</b>	Sample ID: <b>0802304-01CMS</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 6:46</b>		
Client ID:	Run ID: <b>FID-2_080221A</b>				SeqNo: <b>1336424</b>		Prep Date: <b>2/21/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	36.64	1.7	33.32	0.3677	109	70-130	0			
<i>Surr: 2-Fluorobiphenyl</i>	3.646	0.10	3.332	0	109	70-130	0			

<b>MSD</b>	Sample ID: <b>0802304-01CMSD</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 7:36</b>		
Client ID:	Run ID: <b>FID-2_080221A</b>				SeqNo: <b>1336425</b>		Prep Date: <b>2/21/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	36.1	1.7	33.3	0.3677	107	70-130	36.64	1.51	30	
<i>Surr: 2-Fluorobiphenyl</i>	3.461	0.10	3.33	0	104	70-130	3.646	5.18	30	

The following samples were analyzed in this batch:

0802326-01B	0802326-02B	0802326-04C
0802326-05C	0802326-06C	0802326-08B
0802326-09B		

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

CLIENT: Malcolm Pirnie, Inc.

Work Order: 0802326

Project: Oro Grande LF

## QC BATCH REPORT

Batch ID: **28320**

Instrument ID **ICP7500**

Method: **SW6020**

**MBLK** Sample ID: **MBLKS1-022008** Units: **mg/Kg** Analysis Date: **02/20/08 17:15**

Client ID: Run ID: **ICP7500\_080220A** SeqNo: **1331444** Prep Date: **2/20/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	U	0.50								
Arsenic	U	0.50								
Barium	0.1763	0.50								J
Beryllium	U	0.50								
Boron	U	2.5								
Cadmium	U	0.50								
Calcium	U	50								
Chromium	U	0.50								
Cobalt	U	0.50								
Copper	0.2296	0.50								J
Iron	U	50								
Lead	U	0.50								
Magnesium	U	50								
Manganese	U	0.50								
Molybdenum	U	0.50								
Nickel	U	0.50								
Potassium	U	50								
Selenium	0.2529	0.50								J
Silver	0.1023	0.50								J
Sodium	U	50								
Strontium	U	0.50								
Thallium	U	0.50								
Tin	1.129	2.5								J
Titanium	U	0.50								
Vanadium	0.1491	0.50								J
Zinc	U	0.50								

**MBLK** Sample ID: **MBLKS1-022008** Units: **mg/Kg** Analysis Date: **02/21/08 13:02**

Client ID: Run ID: **ICP7500\_080221A** SeqNo: **1332010** Prep Date: **2/20/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	0.6331	1.0								J

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 10 of 37

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

# QC BATCH REPORT

Batch ID: **28320** Instrument ID **ICP7500** Method: **SW6020**

LCS		Sample ID: <b>MLCSS1-022008</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 17:21</b>		
Client ID:		Run ID: <b>ICP7500_080220A</b>				SeqNo: <b>1331445</b>		Prep Date: <b>2/20/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	10.64	0.50	10	0	106	80-120	0			
Arsenic	9.387	0.50	10	0	93.9	80-120	0			
Barium	8.796	0.50	10	0	88	80-120	0			
Beryllium	8.499	0.50	10	0	85	80-120	0			
Boron	45.25	2.5	50	0	90.5	80-120	0			
Cadmium	8.779	0.50	10	0	87.8	80-120	0			
Calcium	941.4	50	1000	0	94.1	80-120	0			
Chromium	9.872	0.50	10	0	98.7	80-120	0			
Cobalt	10.2	0.50	10	0	102	80-120	0			
Copper	8.508	0.50	10	0	85.1	80-120	0			
Iron	907.2	50	1000	0	90.7	80-120	0			
Lead	8.981	0.50	10	0	89.8	80-120	0			
Magnesium	955.5	50	1000	0	95.6	80-120	0			
Manganese	9.71	0.50	10	0	97.1	80-120	0			
Molybdenum	9.003	0.50	10	0	90	80-120	0			
Nickel	8.559	0.50	10	0	85.6	80-120	0			
Potassium	953.2	50	1000	0	95.3	80-120	0			
Selenium	8.42	0.50	10	0	84.2	80-120	0			
Silver	8.833	0.50	10	0	88.3	80-120	0			
Sodium	928.3	50	1000	0	92.8	80-120	0			
Strontium	9.477	0.50	10	0	94.8	80-120	0			
Thallium	8.28	0.50	10	0	82.8	80-120	0			
Tin	10.24	2.5	10	0	102	80-120	0			
Titanium	18.18	0.50	20	0	90.9	80-120	0			
Vanadium	10.18	0.50	10	0	102	80-120	0			
Zinc	8.711	0.50	10	0	87.1	80-120	0			

LCS		Sample ID: <b>MLCSS1-022008</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/21/08 13:08</b>		
Client ID:		Run ID: <b>ICP7500_080221A</b>				SeqNo: <b>1332011</b>		Prep Date: <b>2/20/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	8.937	1.0	10	0	89.4	80-120	0			

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

## QC BATCH REPORT

Batch ID: **28320** Instrument ID **ICP7500** Method: **SW6020**

**MS** Sample ID: **0802326-06CMS** Units: **mg/Kg** Analysis Date: **02/20/08 19:38**  
Client ID: **F14-SB-2 (13-15)** Run ID: **ICP7500\_080220A** SeqNo: **1331475** Prep Date: **2/20/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	6.395	0.48	9.615	0.1028	65.4	75-125	0			S
Arsenic	11.38	0.48	9.615	2.707	90.2	75-125	0			
Barium	77.33	0.48	9.615	30.04	492	75-125	0			S
Beryllium	7.814	0.48	9.615	0.1474	79.7	75-125	0			
Boron	45.81	2.4	48.08	4.882	85.1	75-125	0			
Cadmium	8.122	0.48	9.615	0.01902	84.3	75-125	0			
Calcium	11580	48	961.5	11180	41	75-125	0			SO
Chromium	12.39	0.48	9.615	3.049	97.2	75-125	0			
Cobalt	10.14	0.48	9.615	0.9517	95.6	75-125	0			
Copper	8.359	0.48	9.615	0.911	77.5	75-125	0			
Iron	3812	48	961.5	2791	106	75-125	0			
Lead	10.63	0.48	9.615	2.301	86.7	75-125	0			
Magnesium	2767	48	961.5	1772	104	75-125	0			
Manganese	41.98	0.48	9.615	32.92	94.2	75-125	0			
Molybdenum	8.088	0.48	9.615	0.1188	82.9	75-125	0			
Nickel	9.571	0.48	9.615	1.879	80	75-125	0			
Potassium	1777	48	961.5	809	101	75-125	0			
Selenium	8.052	0.48	9.615	0.3524	80.1	75-125	0			
Silver	7.929	0.48	9.615	0.1002	81.4	75-125	0			
Sodium	1362	48	961.5	453.8	94.5	75-125	0			
Strontium	103.2	0.48	9.615	43.66	619	75-125	0			SO
Thallium	7.51	0.48	9.615	0.0295	77.8	75-125	0			
Tin	9.144	2.4	9.615	1.089	83.8	75-125	0			
Titanium	83.28	0.48	19.23	65.6	92	75-125	0			
Vanadium	21.8	0.48	9.615	12.35	98.3	75-125	0			
Zinc	14.62	0.48	9.615	5.852	91.1	75-125	0			

**MS** Sample ID: **0802326-06CMS** Units: **mg/Kg** Analysis Date: **02/20/08 19:38**  
Client ID: **F14-SB-2 (13-15)** Run ID: **ICP7500\_080220A** SeqNo: **1333844** Prep Date: **2/20/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	2900	0.96	9.615	2338	5840	75-125	0			SEO

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

# QC BATCH REPORT

Batch ID: **28320** Instrument ID **ICP7500** Method: **SW6020**

MSD		Sample ID: <b>0802326-06CMSD</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 19:44</b>		
Client ID: <b>F14-SB-2 (13-15)</b>		Run ID: <b>ICP7500_080220A</b>				SeqNo: <b>1331476</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	6.59	0.48	9.615	0.1028	67.5	75-125	6.395	3.01	25	S
Arsenic	11.4	0.48	9.615	2.707	90.4	75-125	11.38	0.169	25	
Barium	28.5	0.48	9.615	30.04	-16	75-125	77.33	92.3	25	SR
Beryllium	7.843	0.48	9.615	0.1474	80	75-125	7.814	0.368	25	
Boron	45.91	2.4	48.08	4.882	85.3	75-125	45.81	0.231	25	
Cadmium	8.173	0.48	9.615	0.01902	84.8	75-125	8.122	0.625	25	
Calcium	11330	48	961.5	11180	15	75-125	11580	2.18	25	SO
Chromium	12.42	0.48	9.615	3.049	97.5	75-125	12.39	0.232	25	
Cobalt	10.2	0.48	9.615	0.9517	96.2	75-125	10.14	0.567	25	
Copper	8.37	0.48	9.615	0.911	77.6	75-125	8.359	0.138	25	
Iron	3839	48	961.5	2791	109	75-125	3812	0.729	25	
Lead	10.74	0.48	9.615	2.301	87.8	75-125	10.63	0.99	25	
Magnesium	2776	48	961.5	1772	104	75-125	2767	0.312	25	
Manganese	51.03	0.48	9.615	32.92	188	75-125	41.98	19.5	25	S
Molybdenum	8.345	0.48	9.615	0.1188	85.6	75-125	8.088	3.14	25	
Nickel	9.593	0.48	9.615	1.879	80.2	75-125	9.571	0.231	25	
Potassium	1779	48	961.5	809	101	75-125	1777	0.108	25	
Selenium	8.029	0.48	9.615	0.3524	79.8	75-125	8.052	0.287	25	
Silver	8.469	0.48	9.615	0.1002	87	75-125	7.929	6.59	25	
Sodium	1360	48	961.5	453.8	94.2	75-125	1362	0.212	25	
Strontium	54.07	0.48	9.615	43.66	108	75-125	103.2	62.5	25	RO
Thallium	7.699	0.48	9.615	0.0295	79.8	75-125	7.51	2.49	25	
Tin	9.198	2.4	9.615	1.089	84.3	75-125	9.144	0.587	25	
Titanium	86.74	0.48	19.23	65.6	110	75-125	83.28	4.07	25	
Vanadium	22.14	0.48	9.615	12.35	102	75-125	21.8	1.58	25	
Zinc	14.45	0.48	9.615	5.852	89.4	75-125	14.62	1.12	25	

MSD		Sample ID: <b>0802326-06CMSD</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 19:44</b>		
Client ID: <b>F14-SB-2 (13-15)</b>		Run ID: <b>ICP7500_080220A</b>				SeqNo: <b>1333846</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	2885	0.96	9.615	2338	5680	75-125	2900	0.532	25	SEO

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

CLIENT: Malcolm Pirnie, Inc.  
Work Order: 0802326  
Project: Oro Grande LF

## QC BATCH REPORT

Batch ID: **28320** Instrument ID **ICP7500** Method: **SW6020**

DUP Sample ID: **0802326-06CDUP** Units: **mg/Kg** Analysis Date: **02/20/08 19:26**  
Client ID: **F14-SB-2 (13-15)** Run ID: **ICP7500\_080220A** SeqNo: **1331474** Prep Date: **2/20/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	U	0.48	0	0	0	0-0	0.1028	0	25	
Arsenic	2.794	0.48	0	0	0	0-0	2.707	3.18	25	
Barium	22.76	0.48	0	0	0	0-0	30.04	27.6	25	R
Beryllium	0.1479	0.48	0	0	0	0-0	0.1474	0	25	J
Boron	4.84	2.4	0	0	0	0-0	4.882	0.851	25	
Cadmium	U	0.48	0	0	0	0-0	0.01902	0	25	
Calcium	10590	48	0	0	0	0-0	11180	5.48	25	
Chromium	3.134	0.48	0	0	0	0-0	3.049	2.74	25	
Cobalt	0.9415	0.48	0	0	0	0-0	0.9517	1.08	25	
Copper	0.9185	0.48	0	0	0	0-0	0.911	0.82	25	
Iron	2841	48	0	0	0	0-0	2791	1.78	25	
Lead	2.313	0.48	0	0	0	0-0	2.301	0.542	25	
Magnesium	1836	48	0	0	0	0-0	1772	3.52	25	
Manganese	32.01	0.48	0	0	0	0-0	32.92	2.81	25	
Molybdenum	0.116	0.48	0	0	0	0-0	0.1188	0	25	J
Nickel	1.884	0.48	0	0	0	0-0	1.879	0.256	25	
Potassium	827.8	48	0	0	0	0-0	809	2.29	25	
Selenium	0.3281	0.48	0	0	0	0-0	0.3524	0	25	J
Silver	0.1	0.48	0	0	0	0-0	0.1002	0	25	J
Sodium	467.9	48	0	0	0	0-0	453.8	3.07	25	
Strontium	51.19	0.48	0	0	0	0-0	43.66	15.9	25	
Thallium	U	0.48	0	0	0	0-0	0.0295	0	25	
Tin	1.104	2.4	0	0	0	0-0	1.089	0	25	J
Titanium	68.36	0.48	0	0	0	0-0	65.6	4.12	25	
Vanadium	12.42	0.48	0	0	0	0-0	12.35	0.621	25	
Zinc	6.092	0.48	0	0	0	0-0	5.852	4.03	25	

DUP Sample ID: **0802326-06CDUP** Units: **mg/Kg** Analysis Date: **02/21/08 15:08**  
Client ID: **F14-SB-2 (13-15)** Run ID: **ICP7500\_080221A** SeqNo: **1332029** Prep Date: **2/20/2008** DF: **100**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	2744	96	0	0	0	0-0	2338	16	25	

The following samples were analyzed in this batch:

0802326-01B	0802326-02B	0802326-03C
0802326-04C	0802326-05C	0802326-06C
0802326-07C	0802326-08B	0802326-09B
0802326-10C		

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

## QC BATCH REPORT

Batch ID: **28368** Instrument ID **ICP7500** Method: **SW6020**

<b>MBLK</b>		Sample ID: <b>MBLKS2-022208</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/27/08 14:30</b>		
Client ID:		Run ID: <b>ICP7500_080227A</b>			SeqNo: <b>1335835</b>		Prep Date: <b>2/22/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	U	5.0								

<b>LCS</b>		Sample ID: <b>MLCSS2-022208</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/27/08 14:33</b>		
Client ID:		Run ID: <b>ICP7500_080227A</b>			SeqNo: <b>1335836</b>		Prep Date: <b>2/22/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	45.75	5.0	50	0	91.5	80-120	0			

<b>MS</b>		Sample ID: <b>0802326-06DMS</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/27/08 15:11</b>		
Client ID: <b>F14-SB-2 (13-15)</b>		Run ID: <b>ICP7500_080227A</b>			SeqNo: <b>1335846</b>		Prep Date: <b>2/22/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	46.3	4.7	46.73	3.45	91.7	80-120	0			

<b>MSD</b>		Sample ID: <b>0802326-06DMSD</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/27/08 15:15</b>		
Client ID: <b>F14-SB-2 (13-15)</b>		Run ID: <b>ICP7500_080227A</b>			SeqNo: <b>1335847</b>		Prep Date: <b>2/22/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	45.67	4.7	46.73	3.45	90.4	80-120	46.3	1.36	25	

<b>DUP</b>		Sample ID: <b>0802326-06DDUP</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/27/08 15:08</b>		
Client ID: <b>F14-SB-2 (13-15)</b>		Run ID: <b>ICP7500_080227A</b>			SeqNo: <b>1335845</b>		Prep Date: <b>2/22/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	U	4.7	0	0	0		3.45	0		

The following samples were analyzed in this batch:

0802326-01C	0802326-02C	0802326-03D
0802326-04D	0802326-05D	0802326-06D
0802326-07D	0802326-08C	0802326-09C
0802326-10D		

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

CLIENT: Malcolm Pirnie, Inc.  
Work Order: 0802326  
Project: Oro Grande LF

## QC BATCH REPORT

Batch ID: **28373** Instrument ID **Mercury** Method: **SW7471A**

**MBLK** Sample ID: **GBLKS2-022508** Units: **µg/Kg** Analysis Date: **02/25/08 16:13**

Client ID: Run ID: **MERCURY\_080225B** SeqNo: **1334033** Prep Date: **2/25/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	U	13								

**LCS** Sample ID: **GLCSS2-022508** Units: **µg/Kg** Analysis Date: **02/25/08 16:15**

Client ID: Run ID: **MERCURY\_080225B** SeqNo: **1334034** Prep Date: **2/25/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	341.3	13	333.3	0	102	85-115	0			

**LCSD** Sample ID: **GLCSDS2-022508** Units: **µg/Kg** Analysis Date: **02/25/08 16:18**

Client ID: Run ID: **MERCURY\_080225B** SeqNo: **1334035** Prep Date: **2/25/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	349.3	13	333.3	0	105	85-115	341.3	2.32	20	

**MS** Sample ID: **0802326-06CMS** Units: **µg/Kg** Analysis Date: **02/25/08 16:24**

Client ID: **F14-SB-2 (13-15)** Run ID: **MERCURY\_080225B** SeqNo: **1334038** Prep Date: **2/25/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	311.6	13	332.2	-3.082	94.7	85-115	0			

**MSD** Sample ID: **0802326-06CMSD** Units: **µg/Kg** Analysis Date: **02/25/08 16:26**

Client ID: **F14-SB-2 (13-15)** Run ID: **MERCURY\_080225B** SeqNo: **1334039** Prep Date: **2/25/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	316.8	13	330	-3.082	96.9	85-115	311.6	1.66	20	

**DUP** Sample ID: **0802326-06CDUP** Units: **µg/Kg** Analysis Date: **02/25/08 16:22**

Client ID: **F14-SB-2 (13-15)** Run ID: **MERCURY\_080225B** SeqNo: **1334037** Prep Date: **2/25/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	U	13	0	0	0		0	0	20	

The following samples were analyzed in this batch:

0802326-01B	0802326-02B	0802326-03C
0802326-04C	0802326-05C	0802326-06C
0802326-07C	0802326-08B	0802326-09B
0802326-10C		

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

# QC BATCH REPORT

Batch ID: **28295** Instrument ID **SV-4** Method: **SW8270**

**MBLK** Sample ID: **SBLKS1-080219** Units: **µg/Kg** Analysis Date: **02/20/08 16:31**

Client ID: Run ID: **SV-4\_080220A** SeqNo: **1332654** Prep Date: **2/19/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	U	6.6								
2,4,5-Trichlorophenol	U	6.6								
2,4,6-Trichlorophenol	U	6.6								
2,4-Dichlorophenol	U	6.6								
2,4-Dimethylphenol	U	6.6								
2,4-Dinitrophenol	U	33								
2,4-Dinitrotoluene	U	6.6								
2,6-Dinitrotoluene	U	6.6								
2-Chloronaphthalene	U	6.6								
2-Chlorophenol	U	6.6								
2-Methylnaphthalene	U	6.6								
2-Methylphenol	U	6.6								
2-Nitroaniline	U	6.6								
2-Nitrophenol	U	6.6								
3&4-Methylphenol	U	6.6								
3,3'-Dichlorobenzidine	U	6.6								
3-Nitroaniline	U	6.6								
4,6-Dinitro-2-methylphenol	U	6.6								
4-Bromophenyl phenyl ether	U	6.6								
4-Chloro-3-methylphenol	U	6.6								
4-Chloroaniline	U	6.6								
4-Chlorophenyl phenyl ether	U	6.6								
4-Nitroaniline	U	6.6								
4-Nitrophenol	U	33								
Acenaphthene	U	6.6								
Acenaphthylene	U	6.6								
Acetophenone	U	6.6								
Anthracene	U	6.6								
Atrazine	U	6.6								
Benz(a)anthracene	U	6.6								
Benzaldehyde	U	6.6								
Benzo(a)pyrene	U	6.6								
Benzo(b)fluoranthene	U	6.6								
Benzo(g,h,i)perylene	U	6.6								
Benzo(k)fluoranthene	U	6.6								
Bis(2-chloroethoxy)methane	U	6.6								
Bis(2-chloroethyl)ether	U	6.6								
Bis(2-chloroisopropyl)ether	U	6.6								
Bis(2-ethylhexyl)phthalate	U	6.6								
Butyl benzyl phthalate	U	6.6								

ND - Not Detected at the Reporting Limit S - Spike Recovery outside accepted recovery limits B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits R - RPD outside accepted recovery limits U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked P - Dual Column results percent difference > 40% E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

## QC BATCH REPORT

Batch ID: <b>28295</b>		Instrument ID <b>SV-4</b>		Method: <b>SW8270</b>				
Caprolactam	U	6.6						
Carbazole	U	6.6						
Chrysene	U	6.6						
Di-n-butyl phthalate	U	6.6						
Di-n-octyl phthalate	U	6.6						
Dibenz(a,h)anthracene	U	6.6						
Dibenzofuran	U	6.6						
Diethyl phthalate	U	6.6						
Dimethyl phthalate	U	6.6						
Fluoranthene	U	6.6						
Fluorene	U	6.6						
Hexachlorobenzene	U	6.6						
Hexachlorobutadiene	U	6.6						
Hexachlorocyclopentadiene	U	6.6						
Hexachloroethane	U	6.6						
Indeno(1,2,3-cd)pyrene	U	6.6						
Isophorone	U	6.6						
N-Nitrosodi-n-propylamine	U	6.6						
N-Nitrosodiphenylamine	U	6.6						
Naphthalene	U	6.6						
Nitrobenzene	U	6.6						
Pentachlorophenol	U	6.6						
Phenanthrene	U	6.6						
Phenol	U	6.6						
Pyrene	U	6.6						
<i>Surr: 2,4,6-Tribromophenol</i>	<i>145.8</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>87.5</i>	<i>36-126</i>	<i>0</i>	
<i>Surr: 2-Fluorobiphenyl</i>	<i>147.9</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>88.7</i>	<i>43-125</i>	<i>0</i>	
<i>Surr: 2-Fluorophenol</i>	<i>160.6</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>96.4</i>	<i>37-125</i>	<i>0</i>	
<i>Surr: 4-Terphenyl-d14</i>	<i>160.6</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>96.4</i>	<i>32-125</i>	<i>0</i>	
<i>Surr: Nitrobenzene-d5</i>	<i>135.8</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>81.5</i>	<i>37-125</i>	<i>0</i>	
<i>Surr: Phenol-d6</i>	<i>150.7</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>90.4</i>	<i>40-125</i>	<i>0</i>	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 18 of 37

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

# QC BATCH REPORT

Batch ID: **28295** Instrument ID **SV-4** Method: **SW8270**

LCS		Sample ID: <b>SLCSS1-080219</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/20/08 16:53</b>		
Client ID:		Run ID: <b>SV-4_080220A</b>				SeqNo: <b>1332655</b>		Prep Date: <b>2/19/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	135.4	6.6	166.7	0	81.2	40-140	0			
2,4,5-Trichlorophenol	156.4	6.6	166.7	0	93.8	40-140	0			
2,4,6-Trichlorophenol	153.1	6.6	166.7	0	91.9	40-140	0			
2,4-Dichlorophenol	141.8	6.6	166.7	0	85.1	40-140	0			
2,4-Dimethylphenol	163.9	6.6	166.7	0	98.3	40-140	0			
2,4-Dinitrophenol	124.6	33	166.7	0	74.7	40-140	0			
2,4-Dinitrotoluene	150.5	6.6	166.7	0	90.3	40-140	0			
2,6-Dinitrotoluene	154	6.6	166.7	0	92.4	40-140	0			
2-Chloronaphthalene	173.7	6.6	166.7	0	104	40-140	0			
2-Chlorophenol	151.9	6.6	166.7	0	91.1	40-140	0			
2-Methylnaphthalene	142.6	6.6	166.7	0	85.6	43-116	0			
2-Methylphenol	144.9	6.6	166.7	0	86.9	41-115	0			
2-Nitroaniline	140.6	6.6	166.7	0	84.4	40-140	0			
2-Nitrophenol	147.3	6.6	166.7	0	88.4	40-140	0			
3&4-Methylphenol	146.6	6.6	166.7	0	88	40-140	0			
3,3'-Dichlorobenzidine	118.4	6.6	166.7	0	71	40-140	0			
3-Nitroaniline	128.5	6.6	166.7	0	77.1	40-140	0			
4,6-Dinitro-2-methylphenol	140.7	6.6	166.7	0	84.4	40-140	0			
4-Bromophenyl phenyl ether	144.6	6.6	166.7	0	86.8	52-115	0			
4-Chloro-3-methylphenol	159.6	6.6	166.7	0	95.7	40-140	0			
4-Chloroaniline	98.47	6.6	166.7	0	59.1	40-140	0			
4-Chlorophenyl phenyl ether	146.8	6.6	166.7	0	88.1	49-115	0			
4-Nitroaniline	143.5	6.6	166.7	0	86.1	40-140	0			
4-Nitrophenol	159.5	33	166.7	0	95.7	40-140	0			
Acenaphthene	139.3	6.6	166.7	0	83.6	51-115	0			
Acenaphthylene	133.3	6.6	166.7	0	80	51-115	0			
Acetophenone	145.9	6.6	166.7	0	87.6	40-140	0			
Anthracene	142.3	6.6	166.7	0	85.4	55-115	0			
Atrazine	158.4	6.6	166.7	0	95	40-140	0			
Benz(a)anthracene	166.8	6.6	166.7	0	100	48-118	0			
Benzaldehyde	114.6	6.6	166.7	0	68.8	40-140	0			
Benzo(a)pyrene	162.1	6.6	166.7	0	97.3	46-120	0			
Benzo(b)fluoranthene	179.3	6.6	166.7	0	108	42-120	0			
Benzo(g,h,i)perylene	152.9	6.6	166.7	0	91.7	37-132	0			
Benzo(k)fluoranthene	170.5	6.6	166.7	0	102	36-131	0			
Bis(2-chloroethoxy)methane	142.5	6.6	166.7	0	85.5	40-140	0			
Bis(2-chloroethyl)ether	105	6.6	166.7	0	63	40-140	0			
Bis(2-chloroisopropyl)ether	138.7	6.6	166.7	0	83.2	40-140	0			
Bis(2-ethylhexyl)phthalate	159.4	6.6	166.7	0	95.6	38-145	0			
Butyl benzyl phthalate	155.9	6.6	166.7	0	93.5	40-140	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

## QC BATCH REPORT

Batch ID: <b>28295</b>		Instrument ID <b>SV-4</b>		Method: <b>SW8270</b>			
Caprolactam	132.3	6.6	166.7	0	79.4	40-140	0
Carbazole	151.2	6.6	166.7	0	90.7	35-137	0
Chrysene	165.7	6.6	166.7	0	99.4	52-118	0
Di-n-butyl phthalate	151.8	6.6	166.7	0	91.1	40-140	0
Di-n-octyl phthalate	149.7	6.6	166.7	0	89.8	40-140	0
Dibenz(a,h)anthracene	158.6	6.6	166.7	0	95.2	35-133	0
Dibenzofuran	146.8	6.6	166.7	0	88.1	55-115	0
Diethyl phthalate	131.7	6.6	166.7	0	79	40-140	0
Dimethyl phthalate	139.7	6.6	166.7	0	83.8	40-140	0
Fluoranthene	151.2	6.6	166.7	0	90.7	55-117	0
Fluorene	140	6.6	166.7	0	84	52-115	0
Hexachlorobenzene	144.2	6.6	166.7	0	86.5	49-115	0
Hexachlorobutadiene	148.7	6.6	166.7	0	89.2	40-140	0
Hexachlorocyclopentadiene	141.1	6.6	166.7	0	84.6	40-140	0
Hexachloroethane	122.6	6.6	166.7	0	73.6	40-140	0
Indeno(1,2,3-cd)pyrene	154.6	6.6	166.7	0	92.7	35-133	0
Isophorone	132	6.6	166.7	0	79.2	40-140	0
N-Nitrosodi-n-propylamine	141	6.6	166.7	0	84.6	40-140	0
N-Nitrosodiphenylamine	145.4	6.6	166.7	0	87.2	40-140	0
Naphthalene	142.1	6.6	166.7	0	85.3	50-115	0
Nitrobenzene	131.3	6.6	166.7	0	78.8	40-140	0
Pentachlorophenol	166.5	6.6	166.7	0	99.9	20-145	0
Phenanthrene	145.2	6.6	166.7	0	87.1	51-115	0
Phenol	146.2	6.6	166.7	0	87.7	10-110	0
Pyrene	152.9	6.6	166.7	0	91.7	52-115	0
<i>Surr: 2,4,6-Tribromophenol</i>	<i>134.6</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>80.8</i>	<i>36-126</i>	<i>0</i>
<i>Surr: 2-Fluorobiphenyl</i>	<i>137.4</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>82.5</i>	<i>43-125</i>	<i>0</i>
<i>Surr: 2-Fluorophenol</i>	<i>137.9</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>82.7</i>	<i>37-125</i>	<i>0</i>
<i>Surr: 4-Terphenyl-d14</i>	<i>162.1</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>97.3</i>	<i>32-125</i>	<i>0</i>
<i>Surr: Nitrobenzene-d5</i>	<i>138.1</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>82.8</i>	<i>37-125</i>	<i>0</i>
<i>Surr: Phenol-d6</i>	<i>150.7</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>90.4</i>	<i>40-125</i>	<i>0</i>

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

# QC BATCH REPORT

Batch ID: **28295** Instrument ID **SV-4** Method: **SW8270**

MS Sample ID: <b>0802300-03CMS</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/21/08 14:58</b>			
Client ID:		Run ID: <b>SV-4_080220A</b>		SeqNo: <b>1332659</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	136.4	6.6	166.4	0	81.9	40-140	0			
2,4,5-Trichlorophenol	148.6	6.6	166.4	0	89.3	40-140	0			
2,4,6-Trichlorophenol	146.8	6.6	166.4	0	88.2	40-140	0			
2,4-Dichlorophenol	148.1	6.6	166.4	0	89	40-140	0			
2,4-Dimethylphenol	142.5	6.6	166.4	0	85.7	40-140	0			
2,4-Dinitrophenol	72.52	33	166.4	0	43.6	40-140	0			
2,4-Dinitrotoluene	148.3	6.6	166.4	0	89.1	40-140	0			
2,6-Dinitrotoluene	157.6	6.6	166.4	0	94.7	40-140	0			
2-Chloronaphthalene	166.9	6.6	166.4	0	100	40-140	0			
2-Chlorophenol	160.6	6.6	166.4	0	96.5	40-140	0			
2-Methylnaphthalene	145.7	6.6	166.4	0	87.5	43-116	0			
2-Methylphenol	139.9	6.6	166.4	0	84.1	41-115	0			
2-Nitroaniline	126.6	6.6	166.4	0	76.1	40-140	0			
2-Nitrophenol	139.9	6.6	166.4	0	84.1	40-140	0			
3&4-Methylphenol	149.5	6.6	166.4	0	89.8	40-140	0			
3,3'-Dichlorobenzidine	125.2	6.6	166.4	0	75.2	40-140	0			
3-Nitroaniline	118.6	6.6	166.4	0	71.3	40-140	0			
4,6-Dinitro-2-methylphenol	81.11	6.6	166.4	0	48.7	40-140	0			
4-Bromophenyl phenyl ether	137.6	6.6	166.4	0	82.7	52-115	0			
4-Chloro-3-methylphenol	162.3	6.6	166.4	0	97.5	40-140	0			
4-Chloroaniline	101.8	6.6	166.4	0	61.2	40-140	0			
4-Chlorophenyl phenyl ether	149.3	6.6	166.4	0	89.7	49-115	0			
4-Nitroaniline	130.4	6.6	166.4	0	78.4	40-140	0			
4-Nitrophenol	169.5	33	166.4	0	102	40-140	0			
Acenaphthene	140.9	6.6	166.4	0	84.7	51-115	0			
Acenaphthylene	131.8	6.6	166.4	0	79.2	51-115	0			
Acetophenone	145.1	6.6	166.4	0	87.2	40-140	0			
Anthracene	139.9	6.6	166.4	0	84.1	55-115	0			
Atrazine	159	6.6	166.4	0	95.5	40-140	0			
Benz(a)anthracene	173.6	6.6	166.4	0	104	48-118	0			
Benzaldehyde	121.7	6.6	166.4	0	73.1	40-140	0			
Benzo(a)pyrene	171.1	6.6	166.4	0	103	46-120	0			
Benzo(b)fluoranthene	169.9	6.6	166.4	0	102	42-120	0			
Benzo(g,h,i)perylene	158.7	6.6	166.4	0	95.4	37-132	0			
Benzo(k)fluoranthene	157.3	6.6	166.4	0	94.6	36-131	0			
Bis(2-chloroethoxy)methane	140.8	6.6	166.4	0	84.6	40-140	0			
Bis(2-chloroethyl)ether	126.7	6.6	166.4	0	76.1	40-140	0			
Bis(2-chloroisopropyl)ether	122	6.6	166.4	0	73.3	40-140	0			
Bis(2-ethylhexyl)phthalate	180.4	6.6	166.4	14.18	99.9	38-145	0			
Butyl benzyl phthalate	178.2	6.6	166.4	0	107	40-140	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

## QC BATCH REPORT

Batch ID: <b>28295</b>	Instrument ID <b>SV-4</b>		Method: <b>SW8270</b>				
Caprolactam	179.2	6.6	166.4	24.84	92.8	40-140	0
Carbazole	148.5	6.6	166.4	0	89.2	35-137	0
Chrysene	165.7	6.6	166.4	0	99.6	52-118	0
Di-n-butyl phthalate	152.1	6.6	166.4	10.79	84.9	40-140	0
Di-n-octyl phthalate	169.9	6.6	166.4	0	102	40-140	0
Dibenz(a,h)anthracene	165.7	6.6	166.4	0	99.6	35-133	0
Dibenzofuran	137.7	6.6	166.4	0	82.8	55-115	0
Diethyl phthalate	135.9	6.6	166.4	0	81.6	40-140	0
Dimethyl phthalate	146.5	6.6	166.4	0	88.1	40-140	0
Fluoranthene	143.7	6.6	166.4	0	86.4	55-117	0
Fluorene	137.6	6.6	166.4	0	82.7	52-115	0
Hexachlorobenzene	136.5	6.6	166.4	0	82	49-115	0
Hexachlorobutadiene	139.5	6.6	166.4	0	83.8	40-140	0
Hexachlorocyclopentadiene	76.72	6.6	166.4	0	46.1	40-140	0
Hexachloroethane	113.4	6.6	166.4	0	68.2	40-140	0
Indeno(1,2,3-cd)pyrene	159.3	6.6	166.4	0	95.7	35-133	0
Isophorone	136	6.6	166.4	0	81.7	40-140	0
N-Nitrosodi-n-propylamine	134.9	6.6	166.4	0	81.1	40-140	0
N-Nitrosodiphenylamine	149.6	6.6	166.4	0	89.9	40-140	0
Naphthalene	133.2	6.6	166.4	0	80	50-115	0
Nitrobenzene	126.7	6.6	166.4	0	76.2	40-140	0
Pentachlorophenol	149.6	6.6	166.4	0	89.9	20-145	0
Phenanthrene	144.4	6.6	166.4	0	86.8	51-115	0
Phenol	149.6	6.6	166.4	0	89.9	10-110	0
Pyrene	167.9	6.6	166.4	0	101	52-115	0
<i>Surr: 2,4,6-Tribromophenol</i>	<i>118.9</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>71.4</i>	<i>36-126</i>	<i>0</i>
<i>Surr: 2-Fluorobiphenyl</i>	<i>130.9</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>78.7</i>	<i>43-125</i>	<i>0</i>
<i>Surr: 2-Fluorophenol</i>	<i>134.2</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>80.6</i>	<i>37-125</i>	<i>0</i>
<i>Surr: 4-Terphenyl-d14</i>	<i>171.5</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>103</i>	<i>32-125</i>	<i>0</i>
<i>Surr: Nitrobenzene-d5</i>	<i>135.5</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>81.5</i>	<i>37-125</i>	<i>0</i>
<i>Surr: Phenol-d6</i>	<i>145.3</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>87.3</i>	<i>40-125</i>	<i>0</i>

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

# QC BATCH REPORT

Batch ID: **28295** Instrument ID **SV-4** Method: **SW8270**

MSD		Sample ID: <b>0802300-03CMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/21/08 15:19</b>		
Client ID:		Run ID: <b>SV-4_080220A</b>				SeqNo: <b>1332661</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	139.9	6.6	166.6	0	84	40-140	136.4	2.53	30	
2,4,5-Trichlorophenol	147.8	6.6	166.6	0	88.8	40-140	148.6	0.49	30	
2,4,6-Trichlorophenol	152	6.6	166.6	0	91.2	40-140	146.8	3.48	30	
2,4-Dichlorophenol	149.5	6.6	166.6	0	89.8	40-140	148.1	0.947	30	
2,4-Dimethylphenol	141.6	6.6	166.6	0	85	40-140	142.5	0.654	30	
2,4-Dinitrophenol	95.3	33	166.6	0	57.2	40-140	72.52	27.1	30	
2,4-Dinitrotoluene	146	6.6	166.6	0	87.7	40-140	148.3	1.54	30	
2,6-Dinitrotoluene	156.1	6.6	166.6	0	93.7	40-140	157.6	0.961	30	
2-Chloronaphthalene	167.2	6.6	166.6	0	100	40-140	166.9	0.171	30	
2-Chlorophenol	151.7	6.6	166.6	0	91.1	40-140	160.6	5.67	30	
2-Methylnaphthalene	139	6.6	166.6	0	83.5	43-116	145.7	4.68	30	
2-Methylphenol	141.7	6.6	166.6	0	85.1	41-115	139.9	1.26	30	
2-Nitroaniline	139.5	6.6	166.6	0	83.7	40-140	126.6	9.65	30	
2-Nitrophenol	137.3	6.6	166.6	0	82.4	40-140	139.9	1.87	30	
3&4-Methylphenol	153.6	6.6	166.6	0	92.2	40-140	149.5	2.7	30	
3,3'-Dichlorobenzidine	122.9	6.6	166.6	0	73.8	40-140	125.2	1.89	30	
3-Nitroaniline	124.7	6.6	166.6	0	74.9	40-140	118.6	5.01	30	
4,6-Dinitro-2-methylphenol	95.28	6.6	166.6	0	57.2	40-140	81.11	16.1	30	
4-Bromophenyl phenyl ether	138.8	6.6	166.6	0	83.4	52-115	137.6	0.907	30	
4-Chloro-3-methylphenol	164.6	6.6	166.6	0	98.8	40-140	162.3	1.41	30	
4-Chloroaniline	96.86	6.6	166.6	0	58.2	40-140	101.8	5.02	30	
4-Chlorophenyl phenyl ether	154.6	6.6	166.6	0	92.8	49-115	149.3	3.46	30	
4-Nitroaniline	140.1	6.6	166.6	0	84.1	40-140	130.4	7.13	30	
4-Nitrophenol	156.8	33	166.6	0	94.1	40-140	169.5	7.76	30	
Acenaphthene	145.1	6.6	166.6	0	87.1	51-115	140.9	2.99	30	
Acenaphthylene	134.7	6.6	166.6	0	80.8	51-115	131.8	2.17	30	
Acetophenone	134.5	6.6	166.6	0	80.7	40-140	145.1	7.61	30	
Anthracene	126.5	6.6	166.6	0	75.9	55-115	139.9	10.1	30	
Atrazine	155.6	6.6	166.6	0	93.4	40-140	159	2.14	30	
Benz(a)anthracene	158	6.6	166.6	0	94.9	48-118	173.6	9.44	30	
Benzaldehyde	119.6	6.6	166.6	0	71.8	40-140	121.7	1.7	30	
Benzo(a)pyrene	171.2	6.6	166.6	0	103	46-120	171.1	0.0272	30	
Benzo(b)fluoranthene	176.9	6.6	166.6	0	106	42-120	169.9	4.03	30	
Benzo(g,h,i)perylene	156.7	6.6	166.6	0	94.1	37-132	158.7	1.3	30	
Benzo(k)fluoranthene	161.9	6.6	166.6	0	97.2	36-131	157.3	2.88	30	
Bis(2-chloroethoxy)methane	132.8	6.6	166.6	0	79.8	40-140	140.8	5.84	30	
Bis(2-chloroethyl)ether	126	6.6	166.6	0	75.6	40-140	126.7	0.586	30	
Bis(2-chloroisopropyl)ether	121.9	6.6	166.6	0	73.2	40-140	122	0.0951	30	
Bis(2-ethylhexyl)phthalate	178.4	6.6	166.6	14.18	98.6	38-145	180.4	1.11	30	
Butyl benzyl phthalate	161	6.6	166.6	0	96.6	40-140	178.2	10.2	30	

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R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

## QC BATCH REPORT

Batch ID: <b>28295</b>		Instrument ID <b>SV-4</b>		Method: <b>SW8270</b>					
Caprolactam	208	6.6	166.6	24.84	110	40-140	179.2	14.9	30
Carbazole	143.5	6.6	166.6	0	86.1	35-137	148.5	3.44	30
Chrysene	155.1	6.6	166.6	0	93.1	52-118	165.7	6.62	30
Di-n-butyl phthalate	152.9	6.6	166.6	10.79	85.3	40-140	152.1	0.479	30
Di-n-octyl phthalate	180.5	6.6	166.6	0	108	40-140	169.9	6.04	30
Dibenz(a,h)anthracene	160.5	6.6	166.6	0	96.4	35-133	165.7	3.14	30
Dibenzofuran	145.5	6.6	166.6	0	87.4	55-115	137.7	5.52	30
Diethyl phthalate	145.1	6.6	166.6	0	87.1	40-140	135.9	6.57	30
Dimethyl phthalate	149.2	6.6	166.6	0	89.6	40-140	146.5	1.85	30
Fluoranthene	140.9	6.6	166.6	0	84.6	55-117	143.7	1.94	30
Fluorene	145	6.6	166.6	0	87	52-115	137.6	5.24	30
Hexachlorobenzene	135.8	6.6	166.6	0	81.5	49-115	136.5	0.506	30
Hexachlorobutadiene	128.8	6.6	166.6	0	77.3	40-140	139.5	7.99	30
Hexachlorocyclopentadiene	81.01	6.6	166.6	0	48.6	40-140	76.72	5.45	30
Hexachloroethane	121.1	6.6	166.6	0	72.7	40-140	113.4	6.53	30
Indeno(1,2,3-cd)pyrene	167.1	6.6	166.6	0	100	35-133	159.3	4.78	30
Isophorone	128.4	6.6	166.6	0	77.1	40-140	136	5.7	30
N-Nitrosodi-n-propylamine	139.2	6.6	166.6	0	83.6	40-140	134.9	3.13	30
N-Nitrosodiphenylamine	149.2	6.6	166.6	0	89.6	40-140	149.6	0.315	30
Naphthalene	130.2	6.6	166.6	0	78.2	50-115	133.2	2.25	30
Nitrobenzene	131.5	6.6	166.6	0	78.9	40-140	126.7	3.65	30
Pentachlorophenol	106.2	6.6	166.6	0	63.7	20-145	149.6	34	30 R
Phenanthrene	154.6	6.6	166.6	0	92.8	51-115	144.4	6.8	30
Phenol	153.3	6.6	166.6	0	92	10-110	149.6	2.43	30
Pyrene	152.2	6.6	166.6	0	91.4	52-115	167.9	9.81	30
<i>Surr: 2,4,6-Tribromophenol</i>	131.3	6.6	166.6	0	78.8	36-126	118.9	9.95	30
<i>Surr: 2-Fluorobiphenyl</i>	135.3	6.6	166.6	0	81.2	43-125	130.9	3.32	30
<i>Surr: 2-Fluorophenol</i>	136.2	6.6	166.6	0	81.8	37-125	134.2	1.49	30
<i>Surr: 4-Terphenyl-d14</i>	160.5	6.6	166.6	0	96.4	32-125	171.5	6.62	30
<i>Surr: Nitrobenzene-d5</i>	120.4	6.6	166.6	0	72.3	37-125	135.5	11.8	30
<i>Surr: Phenol-d6</i>	145.7	6.6	166.6	0	87.4	40-125	145.3	0.235	30

The following samples were analyzed in this batch:

0802326-03C	0802326-04C	0802326-07C
0802326-10C		

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

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P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

# QC BATCH REPORT

Batch ID: **R60320** Instrument ID **VOA3** Method: **SW8260**

MBLK		Sample ID: <b>VBLKS-022608</b>		Units: <b>µg/Kg</b>		Analysis Date: <b>02/26/08 12:37</b>				
Client ID:		Run ID: <b>VOA3_080226A</b>		SeqNo: <b>1335427</b>		Prep Date:		DF: 1		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	U	5.0								
1,1,2,2-Tetrachloroethane	U	5.0								
1,1,2-Trichlor-1,2,2-trifluoroethane	U	5.0								
1,1,2-Trichloroethane	U	5.0								
1,1-Dichloroethane	U	5.0								
1,1-Dichloroethene	U	5.0								
1,2,4-Trichlorobenzene	U	5.0								
1,2-Dibromo-3-chloropropane	U	5.0								
1,2-Dibromoethane	U	5.0								
1,2-Dichlorobenzene	U	5.0								
1,2-Dichloroethane	U	5.0								
1,2-Dichloropropane	U	5.0								
1,3-Dichlorobenzene	U	5.0								
1,4-Dichlorobenzene	U	5.0								
2-Butanone	U	10								
2-Hexanone	U	10								
4-Methyl-2-pentanone	U	10								
Acetone	U	20								
Benzene	U	5.0								
Bromodichloromethane	U	5.0								
Bromoform	U	5.0								
Bromomethane	U	10								
Carbon disulfide	U	10								
Carbon tetrachloride	U	5.0								
Chlorobenzene	U	5.0								
Chloroethane	U	10								
Chloroform	U	5.0								
Chloromethane	U	10								
cis-1,2-Dichloroethene	U	5.0								
cis-1,3-Dichloropropene	U	5.0								
Cyclohexane	U	5.0								
Dibromochloromethane	U	5.0								
Dichlorodifluoromethane	U	5.0								
Ethylbenzene	U	5.0								
Isopropylbenzene	U	5.0								
Methyl acetate	U	5.0								
Methyl tert-butyl ether	U	5.0								
Methylcyclohexane	U	5.0								
Styrene	U	5.0								
Tetrachloroethene	U	5.0								

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.

**Work Order:** 0802326

**Project:** Oro Grande LF

## QC BATCH REPORT

Batch ID: <b>R60320</b>	Instrument ID <b>VOA3</b>	Method: <b>SW8260</b>
Toluene	U	5.0
trans-1,2-Dichloroethene	U	5.0
trans-1,3-Dichloropropene	U	5.0
Trichloroethene	U	5.0
Trichlorofluoromethane	U	5.0
Vinyl chloride	U	2.0
Xylenes, Total	U	15
<i>Surr: 1,2-Dichloroethane-d4</i>	<i>45.59</i>	<i>0 50 0 91.2 70-128 0</i>
<i>Surr: 4-Bromofluorobenzene</i>	<i>49.46</i>	<i>0 50 0 98.9 73-126 0</i>
<i>Surr: Dibromofluoromethane</i>	<i>49.17</i>	<i>0 50 0 98.3 71-128 0</i>
<i>Surr: Toluene-d8</i>	<i>49.84</i>	<i>0 50 0 99.7 73-127 0</i>

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QC Page: 26 of 37

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

# QC BATCH REPORT

Batch ID: **R60320** Instrument ID **VOA3** Method: **SW8260**

LCS		Sample ID: <b>VLCSS-022608</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/26/08 11:14</b>		
Client ID:		Run ID: <b>VOA3_080226A</b>				SeqNo: <b>1335426</b>		Prep Date:		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	55.51	5.0	50	0	111	79-124	0			
1,1,2,2-Tetrachloroethane	53.07	5.0	50	0	106	75-123	0			
1,1,2-Trichlor-1,2,2-trifluoroethane	59.2	5.0	50	0	118	79-125	0			
1,1,2-Trichloroethane	55.86	5.0	50	0	112	79-120	0			
1,1-Dichloroethane	53.91	5.0	50	0	108	75-124	0			
1,1-Dichloroethene	55.26	5.0	50	0	111	80-122	0			
1,2,4-Trichlorobenzene	57.14	5.0	50	0	114	74-128	0			
1,2-Dibromo-3-chloropropane	52.67	5.0	50	0	105	66-129	0			
1,2-Dibromoethane	54.04	5.0	50	0	108	79-120	0			
1,2-Dichlorobenzene	53.04	5.0	50	0	106	79-120	0			
1,2-Dichloroethane	55.08	5.0	50	0	110	73-121	0			
1,2-Dichloropropane	56.25	5.0	50	0	112	76-120	0			
1,3-Dichlorobenzene	54.64	5.0	50	0	109	79-120	0			
1,4-Dichlorobenzene	54.51	5.0	50	0	109	77-120	0			
2-Butanone	99.3	10	100	0	99.3	65-130	0			
2-Hexanone	105.7	10	100	0	106	65-133	0			
4-Methyl-2-pentanone	100.2	10	100	0	100	69-130	0			
Acetone	105.9	20	100	0	106	53-142	0			
Benzene	56.72	5.0	50	0	113	79-120	0			
Bromodichloromethane	57.21	5.0	50	0	114	79-121	0			
Bromoform	54.73	5.0	50	0	109	74-122	0			
Bromomethane	51.12	10	50	0	102	68-131	0			
Carbon disulfide	110.9	10	100	0	111	80-124	0			
Carbon tetrachloride	57.7	5.0	50	0	115	74-126	0			
Chlorobenzene	54.38	5.0	50	0	109	79-120	0			
Chloroethane	56.76	10	50	0	114	76-126	0			
Chloroform	54.98	5.0	50	0	110	78-120	0			
Chloromethane	51.3	10	50	0	103	69-129	0			
cis-1,2-Dichloroethene	54.2	5.0	50	0	108	80-120	0			
cis-1,3-Dichloropropene	57.22	5.0	50	0	114	77-123	0			
Cyclohexane	57.84	5.0	50	0	116	74-126	0			
Dibromochloromethane	53.7	5.0	50	0	107	78-122	0			
Dichlorodifluoromethane	56.26	5.0	50	0	113	57-140	0			
Ethylbenzene	55.47	5.0	50	0	111	80-122	0			
Isopropylbenzene	56.18	5.0	50	0	112	72-127	0			
Methyl acetate	45.78	5.0	50	0	91.6	69-123	0			
Methyl tert-butyl ether	53.1	5.0	50	0	106	76-121	0			
Methylcyclohexane	58.99	5.0	50	0	118	77-126	0			
Styrene	55.95	5.0	50	0	112	78-124	0			
Tetrachloroethene	59.03	5.0	50	0	118	80-121	0			

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P - Dual Column results percent difference > 40%

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U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

## QC BATCH REPORT

Batch ID: <b>R60320</b>		Instrument ID <b>VOA3</b>		Method: <b>SW8260</b>			
Toluene	54.41	5.0	50	0	109	79-120	0
trans-1,2-Dichloroethene	54.94	5.0	50	0	110	79-122	0
trans-1,3-Dichloropropene	56.26	5.0	50	0	113	77-120	0
Trichloroethene	56.65	5.0	50	0	113	80-121	0
Trichlorofluoromethane	58.19	5.0	50	0	116	75-126	0
Vinyl chloride	58.07	2.0	50	0	116	76-126	0
Xylenes, Total	166.8	15	150	0	111	80-120	0
<i>Surr: 1,2-Dichloroethane-d4</i>	<i>49.61</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>99.2</i>	<i>70-128</i>	<i>0</i>
<i>Surr: 4-Bromofluorobenzene</i>	<i>51.5</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>103</i>	<i>73-126</i>	<i>0</i>
<i>Surr: Dibromofluoromethane</i>	<i>49.95</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>99.9</i>	<i>71-128</i>	<i>0</i>
<i>Surr: Toluene-d8</i>	<i>49.68</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>99.4</i>	<i>73-127</i>	<i>0</i>

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E - Value above quantitation range

QC Page: 28 of 37

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

# QC BATCH REPORT

Batch ID: **R60320** Instrument ID **VOA3** Method: **SW8260**

MS		Sample ID: <b>0802326-01BMS</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/26/08 13:30</b>		
Client ID: <b>F14-SB-3 (0-2)</b>		Run ID: <b>VOA3_080226A</b>				SeqNo: <b>1335429</b>		Prep Date:		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	39.94	5.0	50	0	79.9	79-124	0			
1,1,2,2-Tetrachloroethane	37.66	5.0	50	0	75.3	75-123	0			
1,1,2-Trichlor-1,2,2-trifluoroethane	43.1	5.0	50	0	86.2	79-125	0			
1,1,2-Trichloroethane	39.33	5.0	50	0	78.7	79-120	0			S
1,1-Dichloroethane	37	5.0	50	0	74	75-124	0			S
1,1-Dichloroethene	41.65	5.0	50	0	83.3	80-122	0			
1,2,4-Trichlorobenzene	35.42	5.0	50	0	70.8	74-128	0			S
1,2-Dibromo-3-chloropropane	37.09	5.0	50	0	74.2	66-129	0			
1,2-Dibromoethane	39.78	5.0	50	0	79.6	79-120	0			
1,2-Dichlorobenzene	35.61	5.0	50	0	71.2	79-120	0			S
1,2-Dichloroethane	38.3	5.0	50	0	76.6	73-121	0			
1,2-Dichloropropane	37.94	5.0	50	0	75.9	76-120	0			S
1,3-Dichlorobenzene	36.46	5.0	50	0	72.9	79-120	0			S
1,4-Dichlorobenzene	36.11	5.0	50	0	72.2	77-120	0			S
2-Butanone	71.76	10	100	0	71.8	65-130	0			
2-Hexanone	76.96	10	100	0	77	65-133	0			
4-Methyl-2-pentanone	73.9	10	100	0	73.9	69-130	0			
Acetone	78.8	20	100	0	78.8	53-142	0			
Benzene	39.78	5.0	50	0	79.6	79-120	0			
Bromodichloromethane	38.33	5.0	50	0	76.7	79-121	0			S
Bromoform	38.75	5.0	50	0	77.5	74-122	0			
Bromomethane	36.68	10	50	0	73.4	68-131	0			
Carbon disulfide	80.7	10	100	0	80.7	80-124	0			
Carbon tetrachloride	41.67	5.0	50	0	83.3	74-126	0			
Chlorobenzene	38.43	5.0	50	0	76.9	79-120	0			S
Chloroethane	40.51	10	50	0	81	76-126	0			
Chloroform	38.09	5.0	50	0	76.2	78-120	0			S
Chloromethane	37.31	10	50	0	74.6	69-129	0			
cis-1,2-Dichloroethene	38.35	5.0	50	0	76.7	80-120	0			S
cis-1,3-Dichloropropene	38.56	5.0	50	0	77.1	77-123	0			
Cyclohexane	41.84	5.0	50	0	83.7	74-126	0			
Dibromochloromethane	37.62	5.0	50	0	75.2	78-122	0			S
Dichlorodifluoromethane	41.55	5.0	50	0	83.1	57-140	0			
Ethylbenzene	39.6	5.0	50	0	79.2	80-122	0			S
Isopropylbenzene	39.82	5.0	50	0	79.6	72-127	0			
Methyl acetate	35.07	5.0	50	0	70.1	69-123	0			
Methyl tert-butyl ether	35.62	5.0	50	0	71.2	76-121	0			S
Methylcyclohexane	41.77	5.0	50	0	83.5	77-126	0			
Styrene	39.7	5.0	50	0	79.4	78-124	0			
Tetrachloroethene	43.31	5.0	50	0	86.6	80-121	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

## QC BATCH REPORT

Batch ID: <b>R60320</b>		Instrument ID <b>VOA3</b>		Method: <b>SW8260</b>				
Toluene	38.91	5.0	50	0	77.8	79-120	0	S
trans-1,2-Dichloroethene	39.83	5.0	50	0	79.7	79-122	0	
trans-1,3-Dichloropropene	38.6	5.0	50	0	77.2	77-120	0	
Trichloroethene	41.06	5.0	50	0	82.1	80-121	0	
Trichlorofluoromethane	41.65	5.0	50	0	83.3	75-126	0	
Vinyl chloride	41.74	2.0	50	0	83.5	76-126	0	
Xylenes, Total	119.7	15	150	0	79.8	80-120	0	S
<i>Surr: 1,2-Dichloroethane-d4</i>	<i>46.68</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>93.4</i>	<i>70-128</i>	<i>0</i>	
<i>Surr: 4-Bromofluorobenzene</i>	<i>49.8</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>99.6</i>	<i>73-126</i>	<i>0</i>	
<i>Surr: Dibromofluoromethane</i>	<i>46.14</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>92.3</i>	<i>71-128</i>	<i>0</i>	
<i>Surr: Toluene-d8</i>	<i>48.29</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>96.6</i>	<i>73-127</i>	<i>0</i>	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 30 of 37

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

# QC BATCH REPORT

Batch ID: **R60320** Instrument ID **VOA3** Method: **SW8260**

MSD		Sample ID: <b>0802326-01BMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/26/08 13:58</b>		
Client ID: <b>F14-SB-3 (0-2)</b>		Run ID: <b>VOA3_080226A</b>				SeqNo: <b>1335430</b>		Prep Date:		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	44.66	5.0	50	0	89.3	79-124	39.94	11.1	30	
1,1,2,2-Tetrachloroethane	43.91	5.0	50	0	87.8	75-123	37.66	15.3	30	
1,1,2-Trichlor-1,2,2-trifluoroethane	47.82	5.0	50	0	95.6	79-125	43.1	10.4	30	
1,1,2-Trichloroethane	46.35	5.0	50	0	92.7	79-120	39.33	16.4	30	
1,1-Dichloroethane	42.77	5.0	50	0	85.5	75-124	37	14.5	30	
1,1-Dichloroethene	48.46	5.0	50	0	96.9	80-122	41.65	15.1	30	
1,2,4-Trichlorobenzene	40.48	5.0	50	0	81	74-128	35.42	13.3	30	
1,2-Dibromo-3-chloropropane	46.39	5.0	50	0	92.8	66-129	37.09	22.3	30	
1,2-Dibromoethane	46.24	5.0	50	0	92.5	79-120	39.78	15	30	
1,2-Dichlorobenzene	40.83	5.0	50	0	81.7	79-120	35.61	13.7	30	
1,2-Dichloroethane	44.98	5.0	50	0	90	73-121	38.3	16.1	30	
1,2-Dichloropropane	44.89	5.0	50	0	89.8	76-120	37.94	16.8	30	
1,3-Dichlorobenzene	41.76	5.0	50	0	83.5	79-120	36.46	13.6	30	
1,4-Dichlorobenzene	41.49	5.0	50	0	83	77-120	36.11	13.9	30	
2-Butanone	88.08	10	100	0	88.1	65-130	71.76	20.4	30	
2-Hexanone	92.43	10	100	0	92.4	65-133	76.96	18.3	30	
4-Methyl-2-pentanone	92.28	10	100	0	92.3	69-130	73.9	22.1	30	
Acetone	96.42	20	100	0	96.4	53-142	78.8	20.1	30	
Benzene	45.19	5.0	50	0	90.4	79-120	39.78	12.7	30	
Bromodichloromethane	44.69	5.0	50	0	89.4	79-121	38.33	15.3	30	
Bromoform	46.09	5.0	50	0	92.2	74-122	38.75	17.3	30	
Bromomethane	41.19	10	50	0	82.4	68-131	36.68	11.6	30	
Carbon disulfide	90.12	10	100	0	90.1	80-124	80.7	11	30	
Carbon tetrachloride	47.81	5.0	50	0	95.6	74-126	41.67	13.7	30	
Chlorobenzene	44.44	5.0	50	0	88.9	79-120	38.43	14.5	30	
Chloroethane	46.92	10	50	0	93.8	76-126	40.51	14.7	30	
Chloroform	43.65	5.0	50	0	87.3	78-120	38.09	13.6	30	
Chloromethane	42.59	10	50	0	85.2	69-129	37.31	13.2	30	
cis-1,2-Dichloroethene	42.29	5.0	50	0	84.6	80-120	38.35	9.77	30	
cis-1,3-Dichloropropene	44.87	5.0	50	0	89.7	77-123	38.56	15.1	30	
Cyclohexane	46.39	5.0	50	0	92.8	74-126	41.84	10.3	30	
Dibromochloromethane	44.62	5.0	50	0	89.2	78-122	37.62	17	30	
Dichlorodifluoromethane	46.15	5.0	50	0	92.3	57-140	41.55	10.5	30	
Ethylbenzene	45.56	5.0	50	0	91.1	80-122	39.6	14	30	
Isopropylbenzene	45.15	5.0	50	0	90.3	72-127	39.82	12.5	30	
Methyl acetate	40.13	5.0	50	0	80.3	69-123	35.07	13.5	30	
Methyl tert-butyl ether	42.17	5.0	50	0	84.3	76-121	35.62	16.8	30	
Methylcyclohexane	45.27	5.0	50	0	90.5	77-126	41.77	8.04	30	
Styrene	45.98	5.0	50	0	92	78-124	39.7	14.6	30	
Tetrachloroethene	47.81	5.0	50	0	95.6	80-121	43.31	9.88	30	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

## QC BATCH REPORT

Batch ID: <b>R60320</b>		Instrument ID <b>VOA3</b>		Method: <b>SW8260</b>					
Toluene	44.52	5.0	50	0	89	79-120	38.91	13.5	30
trans-1,2-Dichloroethene	44.81	5.0	50	0	89.6	79-122	39.83	11.8	30
trans-1,3-Dichloropropene	45.27	5.0	50	0	90.5	77-120	38.6	15.9	30
Trichloroethene	46.83	5.0	50	0	93.7	80-121	41.06	13.1	30
Trichlorofluoromethane	47.88	5.0	50	0	95.8	75-126	41.65	13.9	30
Vinyl chloride	48.05	2.0	50	0	96.1	76-126	41.74	14.1	30
Xylenes, Total	136.8	15	150	0	91.2	80-120	119.7	13.4	30
<i>Surr: 1,2-Dichloroethane-d4</i>	48.17	0	50	0	96.3	70-128	46.68	3.14	30
<i>Surr: 4-Bromofluorobenzene</i>	50.49	0	50	0	101	73-126	49.8	1.37	30
<i>Surr: Dibromofluoromethane</i>	47.17	0	50	0	94.3	71-128	46.14	2.19	30
<i>Surr: Toluene-d8</i>	49.37	0	50	0	98.7	73-127	48.29	2.22	30

The following samples were analyzed in this batch:

0802326-01B	0802326-02B	0802326-03B
0802326-04B	0802326-05B	0802326-06B
0802326-07B	0802326-08B	0802326-09B
0802326-10B		

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 32 of 37



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

# QC BATCH REPORT

Batch ID: **28396** Instrument ID **UV-2450** Method: **E365.3** **(Dissolve)**

**MBLK** Sample ID: **WBLKW1-022608** Units: **mg/Kg** Analysis Date: **02/26/08 9:30**

Client ID: Run ID: **UV-2450\_080226A** SeqNo: **1334353** Prep Date: **2/26/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Phosphorus, Dissolved (As P)	U	0.13								
Phosphorus, Total (As P)	U	0.50								
Phosphorus, Total Orthophosphate	U	0.13								

**LCS** Sample ID: **WLCSW1-022608** Units: **mg/Kg** Analysis Date: **02/26/08 9:30**

Client ID: Run ID: **UV-2450\_080226A** SeqNo: **1334354** Prep Date: **2/26/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Phosphorus, Total (As P)	12.9	0.50	12.5	0	103	80-120	0			

**LCSD** Sample ID: **WLCSW1-022608** Units: **mg/Kg** Analysis Date: **02/26/08 9:30**

Client ID: Run ID: **UV-2450\_080226A** SeqNo: **1334368** Prep Date: **2/26/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Phosphorus, Total (As P)	12.4	0.50	12.5	0	99.2	80-120	0			

**MS** Sample ID: **0802326-10CMS** Units: **mg/Kg** Analysis Date: **02/26/08 9:30**

Client ID: **F14-SB-5 (28-30)** Run ID: **UV-2450\_080226A** SeqNo: **1334366** Prep Date: DF: **5**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Phosphorus, Total (As P)	117.2	2.5	12.5	122.8	-44	80-120	0			SO

**DUP** Sample ID: **0802326-10CDUP** Units: **mg/Kg** Analysis Date: **02/26/08 9:30**

Client ID: **F14-SB-5 (28-30)** Run ID: **UV-2450\_080226A** SeqNo: **1334365** Prep Date: DF: **5**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Phosphorus, Dissolved (As P)	U	0.65	0	0	0	0-0	0	0	20	
Phosphorus, Total (As P)	121.5	2.5	0	0	0	0-0	122.8	1.02	20	
Phosphorus, Total Orthophosphate	U	0.65	0	0	0	0-0	0	0	20	

The following samples were analyzed in this batch:

0802326-01B	0802326-02B	0802326-03C
0802326-04C	0802326-05C	0802326-06C
0802326-07C	0802326-08B	0802326-09B
0802326-10C		

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

## QC BATCH REPORT

Batch ID: **R60094** Instrument ID **BALANCE1** Method: **E160.3**

DUP		Sample ID: 0802326-01BDUP				Units: wt%		Analysis Date: 02/19/08 15:30		
Client ID: F14-SB-3 (0-2)		Run ID: BALANCE1_080219C				SeqNo: 1330965		Prep Date:		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Percent Moisture	3.417	0.010	0	0	0	0-0	3.319	2.94	20	

DUP	Sample ID: 0802353-09ADUP					Units: wt%		Analysis Date: 02/19/08 15:30		
Client ID:	Run ID: BALANCE1_080219C				SeqNo: 1330984		Prep Date:		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Percent Moisture	31.19	0.010	0	0	0	0-0	31.37	0.567	20	

The following samples were analyzed in this batch:

0802326-01B	0802326-02B	0802326-03C
0802326-04C	0802326-05C	0802326-06C
0802326-07C	0802326-08B	0802326-09B
0802326-10C		

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 34 of 37

CLIENT: Malcolm Pirnie, Inc.

Work Order: 0802326

Project: Oro Grande LF

## QC BATCH REPORT

Batch ID: **R60138**

Instrument ID **UV-2450**

Method: **SW9014**

<b>MBLK</b>		Sample ID: <b>WBLKW1-022108</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/21/08 9:30</b>		
Client ID:		Run ID: <b>UV-2450_080221C</b>				SeqNo: <b>1331744</b>		Prep Date:		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	U	2.0								
Cyanide, Amenable to Chlorination	U	2.0								

<b>LCS</b>		Sample ID: <b>WLCSW1-022108</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/21/08 9:30</b>		
Client ID:		Run ID: <b>UV-2450_080221C</b>				SeqNo: <b>1331745</b>		Prep Date:		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	9.45	2.0	10	0	94.5	80-120	0			

<b>MS</b>		Sample ID: <b>0802326-05CMS</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/21/08 9:30</b>		
Client ID: <b>F14-SB-2 (0-2)</b>		Run ID: <b>UV-2450_080221C</b>				SeqNo: <b>1331751</b>		Prep Date:		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	9.55	2.0	10	0.1	94.5	75-125	0			

<b>DUP</b>		Sample ID: <b>0802326-05CDUP</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/21/08 9:30</b>		
Client ID: <b>F14-SB-2 (0-2)</b>		Run ID: <b>UV-2450_080221C</b>				SeqNo: <b>1331750</b>		Prep Date:		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	U	2.0	0	0	0	0-0	0.1	0	20	
Cyanide, Amenable to Chlorination	U	2.0	0	0	0	0-0	0	0	0	

The following samples were analyzed in this batch:

0802326-05C	0802326-06C	0802326-07C
0802326-10C		

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802326  
**Project:** Oro Grande LF

## QC BATCH REPORT

Batch ID: **R60294** Instrument ID **UV-2450** Method: **SM4500-SiD**

<b>MBLK</b>	Sample ID: <b>WBLKS2-022608</b>				Units: <b>mg/kg</b>			Analysis Date: <b>02/26/08 14:50</b>		
Client ID:	Run ID: <b>UV-2450_080226D</b>				SeqNo: <b>1334951</b>	Prep Date:		DF: 1		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Silica, Dissolved (as SiO2)	U	0.10								

<b>LCS</b>	Sample ID: <b>WLCSS2-022608</b>				Units: <b>mg/kg</b>			Analysis Date: <b>02/26/08 14:50</b>		
Client ID:	Run ID: <b>UV-2450_080226D</b>				SeqNo: <b>1334952</b>	Prep Date:		DF: 1		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Silica, Dissolved (as SiO2)	5.33	0.10	5	0	107	80-120	0			

<b>MS</b>	Sample ID: <b>0802326-02BMS</b>				Units: <b>mg/kg</b>			Analysis Date: <b>02/26/08 14:50</b>		
Client ID: <b>F14-SB-3 (13-15)</b>	Run ID: <b>UV-2450_080226D</b>				SeqNo: <b>1334964</b>	Prep Date:		DF: 1		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Silica, Dissolved (as SiO2)	12.9	0.10	5	9.21	73.8	80-120	0			S

<b>DUP</b>	Sample ID: <b>0802326-02BDUP</b>				Units: <b>mg/kg</b>			Analysis Date: <b>02/26/08 14:50</b>		
Client ID: <b>F14-SB-3 (13-15)</b>	Run ID: <b>UV-2450_080226D</b>				SeqNo: <b>1334963</b>	Prep Date:		DF: 1		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Silica, Dissolved (as SiO2)	9.06	0.10	0	0	0		9.21	1.64		

The following samples were analyzed in this batch:

0802326-01B	0802326-02B	0802326-03C
0802326-04C	0802326-05C	0802326-06C
0802326-07C	0802326-08B	0802326-09B
0802326-10C		

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 36 of 37

CLIENT: Malcolm Pirnie, Inc.

Work Order: 0802326

Project: Oro Grande LF

## QC BATCH REPORT

Batch ID: **R60303**

Instrument ID **UV-2450**

Method: **SW9014**

**MBLK** Sample ID: **WBLKW1-022508** Units: **mg/Kg** Analysis Date: **02/25/08 12:00**

Client ID: Run ID: **UV-2450\_080225C** SeqNo: **1335045** Prep Date: DF: 1

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	U	2.0								
Cyanide, Amenable to Chlorination	U	2.0								

**LCS** Sample ID: **WLCSW1-022508** Units: **mg/Kg** Analysis Date: **02/25/08 12:00**

Client ID: Run ID: **UV-2450\_080225C** SeqNo: **1335046** Prep Date: DF: 1

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	10.15	2.0	10	0	102	80-120	0			

**MS** Sample ID: **0802326-03CMS** Units: **mg/Kg** Analysis Date: **02/25/08 12:00**

Client ID: **F14-SB-3 (28-30)** Run ID: **UV-2450\_080225C** SeqNo: **1335054** Prep Date: DF: 1

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	9.45	2.0	10	-0.05	95	75-125	0			

**DUP** Sample ID: **0802326-03CDUP** Units: **mg/Kg** Analysis Date: **02/25/08 12:00**

Client ID: **F14-SB-3 (28-30)** Run ID: **UV-2450\_080225C** SeqNo: **1335053** Prep Date: DF: 1

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	U	2.0	0	0	0	0-0	-0.05	0	20	
Cyanide, Amenable to Chlorination	U	2.0	0	0	0	0-0	0	0	0	

The following samples were analyzed in this batch:

0802326-01B	0802326-02B	0802326-03C
0802326-04C	0802326-08B	0802326-09B

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_  
 Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802326  
 Instrument ID: VOA3 Calibration Date(s): 02/22/08 02/22/08  
 Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1839 2313

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2
		A0	A1	A2	
Dichlorodifluoromethane	AVRG		0.22529496		13.7
Chloromethane	AVRG		0.50395004		6.4
Vinyl Chloride	AVRG		0.38061303		12.8
Bromomethane	AVRG		0.47034754		6.3
Chloroethane	AVRG		0.25590152		13.3
Trichlorofluoromethane	AVRG		0.52093848		11.4
Acetone	2ORDR	-0.1030328	7.69742006	-0.4850961	1.000
1,1-Dichloroethene	AVRG		0.44134287		11.8
Methylene Chloride	2ORDR	-2.67e-002	2.12273658	-8.33e-002	1.000
Carbon Disulfide	AVRG		1.23232143		8.2
trans-1,2-Dichloroethene	AVRG		0.52949026		7.2
1,1-Dichloroethane	AVRG		0.62436785		6.0
2-Butanone	AVRG		0.27355813		4.7
cis-1,2-Dichloroethene	AVRG		0.56688104		6.0
Chloroform	AVRG		0.64832752		4.1
1,1,1-Trichloroethane	AVRG		0.56575531		8.3
1,2-Dichloroethane	AVRG		0.21292786		6.0
Carbon Tetrachloride	AVRG		0.31001095		11.5
Benzene	AVRG		0.98477378		5.4
Trichloroethene	AVRG		0.37385412		9.0
Bromodichloromethane	AVRG		0.30312539		7.3
1,2-Dichloropropane	AVRG		0.21848339		6.6
4-Methyl-2-Pentanone	AVRG		0.41051773		6.9
cis-1,3-Dichloropropene	AVRG		0.35972479		6.2
Toluene	AVRG		1.34768016		5.9
trans-1,3-Dichloropropene	AVRG		0.28056964		5.9
2-Hexanone	AVRG		0.27008591		5.0
1,1,2-Trichloroethane	AVRG		0.21712708		4.3
Dibromochloromethane	AVRG		0.35828242		7.5
Tetrachloroethene	AVRG		0.32100523		10.8
1,2-Dibromoethane	AVRG		0.34318420		6.2
Chlorobenzene	AVRG		1.07891045		6.5
Ethylbenzene	AVRG		0.53165863		8.6
m,p-Xylenes	AVRG		0.67727071		8.0
o-Xylene	AVRG		0.64914349		8.2
Styrene	AVRG		1.13325264		8.9
Bromoform	AVRG		0.25184687		8.7

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_  
 Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802326  
 Instrument ID: VOA3 Calibration Date(s): 02/22/08 02/22/08  
 Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1839 2313

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2
		A0	A1	A2	
Isopropylbenzene	AVRG		1.42085798		9.5
1,1,2,2-Tetrachloroethane	AVRG		0.67886333		4.0
1,3-Dichlorobenzene	AVRG		1.60773650		6.6
1,4-Dichlorobenzene	AVRG		1.63839256		5.9
1,2-Dichlorobenzene	AVRG		1.53650202		5.9
1,2-Dibromo-3-Chloropropane	AVRG		0.14824980		9.3
1,2,4-Trichlorobenzene	AVRG		0.99308149		9.6
Methyl tert-butyl ether	AVRG		1.01876955		4.3
Methylcyclohexane	AVRG		0.71459521		14.9
Cyclohexane	AVRG		0.69216911		14.6
Freon TF	AVRG		0.48314480		13.6
Methyl Acetate	AVRG		0.84402848		6.4
Dibromofluoromethane	AVRG		0.53239644		1.8
1,2-Dichloroethane-d4	AVRG		0.27529825		3.4
Toluene-d8	AVRG		1.25374927		2.1
4-Bromofluorobenzene	AVRG		0.45418738		3.2

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802326

Instrument ID: VOA3

Calibration Date(s): 02/22/08 02/22/08

Column: DB624

ID: 0.18 (mm)

Calibration Time(s): 1839

2313

LAB FILE ID:

RF2.5: G022203

RF5: G022204

RF10: G022205

RF20: G022206

RF50: G022213

COMPOUND	RF2.5	RF5	RF10	RF20	RF50
Dichlorodifluoromethane		0.196	0.190	0.194	0.262
Chloromethane	0.539	0.551	0.477	0.473	0.528
Vinyl Chloride	0.325	0.332	0.332	0.356	0.431
Bromomethane	0.523	0.492	0.441	0.431	0.482
Chloroethane	0.194	0.237	0.230	0.256	0.282
Trichlorofluoromethane	0.458	0.471	0.466	0.470	0.590
Acetone	0.246	0.212	0.167	0.154	0.134
1,1-Dichloroethene	0.401	0.398	0.371	0.404	0.500
Methylene Chloride	0.674	0.592	0.501	0.516	0.514
Carbon Disulfide	1.202	1.158	1.092	1.122	1.318
trans-1,2-Dichloroethene	0.500	0.512	0.472	0.509	0.576
1,1-Dichloroethane	0.635	0.612	0.548	0.606	0.660
2-Butanone	0.293	0.284	0.267	0.281	0.256
cis-1,2-Dichloroethene	0.539	0.570	0.502	0.568	0.584
Chloroform	0.641	0.657	0.594	0.661	0.686
1,1,1-Trichloroethane	0.551	0.560	0.489	0.510	0.616
1,2-Dichloroethane	0.192	0.218	0.196	0.220	0.227
Carbon Tetrachloride	0.289	0.298	0.276	0.262	0.366
Benzene	0.950	0.987	0.894	0.962	1.067
Trichloroethene	0.380	0.354	0.323	0.347	0.432
Bromodichloromethane	0.274	0.295	0.272	0.310	0.330
1,2-Dichloropropane	0.192	0.222	0.205	0.220	0.237
4-Methyl-2-Pentanone	0.435	0.456	0.398	0.430	0.399
cis-1,3-Dichloropropene	0.342	0.351	0.323	0.366	0.391
Toluene	1.419	1.326	1.243	1.287	1.494
trans-1,3-Dichloropropene	0.260	0.277	0.255	0.293	0.302
2-Hexanone	0.252	0.284	0.260	0.283	0.276
1,1,2-Trichloroethane	0.209	0.223	0.208	0.224	0.232
Dibromochloromethane	0.333	0.351	0.319	0.362	0.398
Tetrachloroethene	0.319	0.304	0.288	0.277	0.388
1,2-Dibromoethane	0.328	0.341	0.315	0.357	0.374
Chlorobenzene	1.118	1.053	0.978	1.057	1.210
Ethylbenzene	0.567	0.506	0.473	0.484	0.609
m,p-Xylenes	0.678	0.643	0.613	0.637	0.786
o-Xylene	0.663	0.600	0.588	0.615	0.748
Styrene	1.068	1.032	1.023	1.110	1.322
Bromoform	0.230	0.248	0.230	0.248	0.288

FORM VI VOA



FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802326

Instrument ID: VOA3

Calibration Date(s): 02/22/08 02/22/08

Column: DB624

ID: 0.18 (mm)

Calibration Time(s): 1839 2313

LAB FILE ID:

RF2.5: G022203

RF5: G022204

RF10: G022205

RF20: G022206

RF50: G022213

COMPOUND	RF2.5	RF5	RF10	RF20	RF50
=====	=====	=====	=====	=====	=====
Isopropylbenzene	1.432	1.295	1.266	1.303	1.668
1,1,2,2-Tetrachloroethane	0.654	0.713	0.666	0.719	0.689
1,3-Dichlorobenzene	1.653	1.545	1.460	1.558	1.812
1,4-Dichlorobenzene	1.676	1.641	1.486	1.600	1.813
1,2-Dichlorobenzene	1.607	1.504	1.422	1.519	1.704
1,2-Dibromo-3-Chloropropane	0.124	0.143	0.144	0.153	0.161
1,2,4-Trichlorobenzene	0.984	0.923	0.878	0.928	1.152
Methyl tert-butyl ether	0.980	1.074	0.956	1.063	1.032
Methylcyclohexane	0.679	0.592	0.604	0.600	0.831
Cyclohexane	0.638	0.577	0.585	0.599	0.785
Freon TF	0.430	0.422	0.420	0.419	0.556
Methyl Acetate	0.943	0.800	0.838	0.879	0.792
=====	=====	=====	=====	=====	=====
Dibromofluoromethane	0.527	0.533	0.532	0.552	0.538
1,2-Dichloroethane-d4	0.279	0.282	0.279	0.281	0.266
Toluene-d8	1.219	1.251	1.246	1.259	1.302
4-Bromofluorobenzene	0.438	0.444	0.450	0.451	0.474

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802326

Instrument ID: VOA3 Calibration Date(s): 02/22/08 02/22/08

Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1839 2313

LAB FILE ID: RF100: G022208 RF150: G022209 RF200: G022210

COMPOUND	RF100	RF150	RF200
Dichlorodifluoromethane	0.242	0.253	0.240
Chloromethane	0.482	0.512	0.469
Vinyl Chloride	0.425	0.434	0.409
Bromomethane	0.457	0.478	0.458
Chloroethane	0.286	0.295	0.267
Trichlorofluoromethane	0.571	0.585	0.556
Acetone	0.137	0.142	0.141
1,1-Dichloroethene	0.482	0.496	0.477
Methylene Chloride	0.486	0.507	
Carbon Disulfide	1.310	1.361	1.295
trans-1,2-Dichloroethene	0.535	0.581	0.551
1,1-Dichloroethane	0.628	0.670	0.635
2-Butanone	0.257	0.274	0.276
cis-1,2-Dichloroethene	0.575	0.618	0.579
Chloroform	0.644	0.666	0.638
1,1,1-Trichloroethane	0.592	0.613	0.593
1,2-Dichloroethane	0.210	0.221	0.220
Carbon Tetrachloride	0.318	0.325	0.347
Benzene	0.975	1.022	1.022
Trichloroethene	0.371	0.382	0.402
Bromodichloromethane	0.300	0.320	0.324
1,2-Dichloropropane	0.214	0.228	0.229
4-Methyl-2-Pentanone	0.370	0.385	0.409
cis-1,3-Dichloropropene	0.350	0.377	0.377
Toluene	1.299	1.341	1.373
trans-1,3-Dichloropropene	0.276	0.290	0.292
2-Hexanone	0.256	0.264	0.285
1,1,2-Trichloroethane	0.206	0.215	0.222
Dibromochloromethane	0.346	0.369	0.389
Tetrachloroethene	0.320	0.323	0.348
1,2-Dibromoethane	0.322	0.342	0.366
Chlorobenzene	1.026	1.074	1.115
Ethylbenzene	0.517	0.537	0.560
m,p-Xylenes	0.660	0.684	0.716
o-Xylene	0.627	0.661	0.691
Styrene	1.120	1.179	1.212
Bromoform	0.236	0.252	0.282

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802326

Instrument ID: VOA3 Calibration Date(s): 02/22/08 02/22/08

Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1839 2313

LAB FILE ID: RF100: G022208 RF150: G022209 RF200: G022210

COMPOUND	RF100	RF150	RF200
=====	=====	=====	=====
Isopropylbenzene	1.418	1.451	1.533
1,1,2,2-Tetrachloroethane	0.640	0.670	0.679
1,3-Dichlorobenzene	1.550	1.616	1.666
1,4-Dichlorobenzene	1.561	1.640	1.691
1,2-Dichlorobenzene	1.450	1.507	1.579
1,2-Dibromo-3-Chloropropane	0.141	0.149	0.170
1,2,4-Trichlorobenzene	0.956	1.013	1.110
Methyl tert-butyl ether	0.979	1.052	1.014
Methylcyclohexane	0.788	0.820	0.803
Cyclohexane	0.778	0.809	0.766
Freon TF	0.530	0.556	0.533
Methyl Acetate	0.806	0.887	0.806
=====	=====	=====	=====
Dibromofluoromethane	0.529	0.529	0.519
1,2-Dichloroethane-d4	0.276	0.282	0.256
Toluene-d8	1.238	1.238	1.277
4-Bromofluorobenzene	0.442	0.456	0.478

FORM VI VOA

FORM 7  
VOLATILE CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802326

Instrument ID: VOA3 Calibration Date: 02/26/08 Time: 1047

Lab File ID: G022602 Init. Calib. Date(s): 02/22/08 02/22/08

Heated Purge: (Y/N) Y Init. Calib. Times: 1839 2313

GC Column: DB624 ID: 0.18 (mm)

COMPOUND	SAMPLE AMOUNT	CAL50 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
Dichlorodifluoromethane	53.64	50.00	AVRG	7.3	20.0
Chloromethane	48.03	50.00	AVRG	3.9	20.0
Vinyl Chloride	54.02	50.00	AVRG	8.0	20.0
Bromomethane	48.55	50.00	AVRG	2.9	20.0
Chloroethane	55.36	50.00	AVRG	10.7	20.0
Trichlorofluoromethane	55.74	50.00	AVRG	11.5	20.0
Acetone	98.53	100.00	2ORDR	1.5	20.0
1,1-Dichloroethene	56.67	50.00	AVRG	13.3	20.0
Methylene Chloride	52.75	50.00	2ORDR	5.5	20.0
Carbon Disulfide	107.75	100.00	AVRG	7.8	20.0
trans-1,2-Dichloroethene	54.07	50.00	AVRG	8.1	20.0
1,1-Dichloroethane	50.14	50.00	AVRG	0.3	20.0
2-Butanone	92.56	100.00	AVRG	7.4	20.0
cis-1,2-Dichloroethene	52.90	50.00	AVRG	5.8	20.0
Chloroform	51.74	50.00	AVRG	3.5	20.0
1,1,1-Trichloroethane	53.17	50.00	AVRG	6.3	20.0
1,2-Dichloroethane	52.75	50.00	AVRG	5.5	20.0
Carbon Tetrachloride	53.62	50.00	AVRG	7.2	20.0
Benzene	53.28	50.00	AVRG	6.6	20.0
Trichloroethene	54.04	50.00	AVRG	8.1	20.0
Bromodichloromethane	53.47	50.00	AVRG	6.9	20.0
1,2-Dichloropropane	52.30	50.00	AVRG	4.6	20.0
4-Methyl-2-Pentanone	85.21	100.00	AVRG	14.8	20.0
cis-1,3-Dichloropropene	53.28	50.00	AVRG	6.6	20.0
Toluene	50.65	50.00	AVRG	1.3	20.0
trans-1,3-Dichloropropene	52.57	50.00	AVRG	5.1	20.0
2-Hexanone	94.22	100.00	AVRG	5.8	20.0
1,1,2-Trichloroethane	51.53	50.00	AVRG	3.1	20.0
Dibromochloromethane	51.24	50.00	AVRG	2.5	20.0
Tetrachloroethene	56.48	50.00	AVRG	13.0	20.0
1,2-Dibromoethane	50.66	50.00	AVRG	1.3	20.0
Chlorobenzene	51.01	50.00	AVRG	2.0	20.0
Ethylbenzene	52.38	50.00	AVRG	4.8	20.0
m,p-Xylenes	105.47	100.00	AVRG	5.5	20.0
o-Xylene	51.88	50.00	AVRG	3.8	20.0
Styrene	52.68	50.00	AVRG	5.4	20.0
Bromoform	50.66	50.00	AVRG	1.3	20.0

FORM 7  
VOLATILE CONTINUING CALIBRATION CHECK

Lab Name: Contract:  
Lab Code: Case No.: SAS No.: SDG No.: 0802326  
Instrument ID: VOA3 Calibration Date: 02/26/08 Time: 1047  
Lab File ID: G022602 Init. Calib. Date(s): 02/22/08 02/22/08  
Heated Purge: (Y/N) Y Init. Calib. Times: 1839 2313  
GC Column: DB624 ID: 0.18 (mm)

COMPOUND	SAMPLE AMOUNT	CAL50 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
Isopropylbenzene	52.75	50.00	AVRG	5.5	20.0
1,1,2,2-Tetrachloroethane	49.90	50.00	AVRG	0.2	20.0
1,3-Dichlorobenzene	51.67	50.00	AVRG	3.3	20.0
1,4-Dichlorobenzene	51.35	50.00	AVRG	2.7	20.0
1,2-Dichlorobenzene	49.89	50.00	AVRG	0.2	20.0
1,2-Dibromo-3-Chloropropane	49.39	50.00	AVRG	1.2	20.0
1,2,4-Trichlorobenzene	53.43	50.00	AVRG	6.9	20.0
Methyl tert-butyl ether	49.34	50.00	AVRG	1.3	20.0
Methylcyclohexane	56.65	50.00	AVRG	13.3	20.0
Cyclohexane	54.96	50.00	AVRG	9.9	20.0
Freon TF	56.49	50.00	AVRG	13.0	20.0
Methyl Acetate	47.05	50.00	AVRG	5.9	20.0
=====	=====	=====	=====	=====	=====
Dibromofluoromethane	50.20	50.00	AVRG	0.4	20.0
1,2-Dichloroethane-d4	50.81	50.00	AVRG	1.6	20.0
Toluene-d8	50.93	50.00	AVRG	1.9	20.0
4-Bromofluorobenzene	53.56	50.00	AVRG	7.1	20.0

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802326

Instrument ID: SV4 Calibration Date(s): 02/18/08 02/18/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1456 1707

LAB FILE ID: RF0.2: 04 RF0.5: 05 RF1: 06  
RF2.5: 07 RF5: 08

COMPOUND	RF0.2	RF0.5	RF1	RF2.5	RF5
Phenol	1.358	1.374	1.643	1.828	1.689
Bis(2-chloroethyl) ether	1.100	1.631	1.262	1.632	1.469
2-Chlorophenol	1.103	1.102	1.253	1.394	1.436
2-Methylphenol	1.539	1.022	1.138	1.404	1.316
bis(2-Chloroisopropyl) ether	0.946	0.546	0.604	0.737	0.735
3&4-Methylphenol	1.295	1.345	1.391	1.505	1.569
N-Nitroso-di-n-propylamine	1.310	0.803	0.919	0.993	1.032
Hexachloroethane	0.612	0.548	0.552	0.636	0.596
Nitrobenzene	0.343	0.374	0.376	0.383	0.367
Isophorone	0.780	0.575	0.618	0.575	0.580
2-Nitrophenol	0.253	0.186	0.215	0.209	0.207
2,4-Dimethylphenol	0.250	0.309	0.309	0.328	0.349
Bis(2-chloroethoxy)methane	0.518	0.368	0.393	0.404	0.399
2,4-Dichlorophenol	0.253	0.309	0.276	0.288	0.271
Naphthalene	1.121	0.987	1.033	1.052	0.962
4-Chloroaniline	0.452	0.454	0.423	0.462	0.444
Hexachlorobutadiene	0.130	0.137	0.140	0.157	0.158
4-Chloro-3-Methylphenol	0.291	0.263	0.273	0.298	0.300
2-Methylnaphthalene	0.610	0.528	0.572	0.576	0.553
Hexachlorocyclopentadiene	0.420	0.354	0.407	0.390	0.364
2,4,6-Trichlorophenol	0.348	0.389	0.441	0.392	0.395
2,4,5-Trichlorophenol	0.366	0.333	0.410	0.477	0.388
2-Chloronaphthalene	1.174	1.018	1.119	1.273	1.120
2-Nitroaniline	0.363	0.392	0.379	0.381	0.388
Dimethylphthalate	1.244	1.436	1.492	1.412	1.280
Acenaphthylene	2.084	2.247	2.194	2.087	1.800
2,6-Dinitrotoluene	0.328	0.254	0.371	0.393	0.337
3-Nitroaniline	0.467	0.409	0.430	0.401	0.410
Acenaphthene	1.095	1.210	1.236	1.257	1.123
2,4-Dinitrophenol	0.195	0.170	0.206	0.241	0.234
Dibenzofuran	1.785	1.644	1.693	1.709	1.519
4-Nitrophenol	0.233	0.128	0.214	0.215	0.207
2,4-Dinitrotoluene	0.414	0.402	0.502	0.490	0.423
Diethylphthalate	1.707	1.447	1.572	1.570	1.360
4-Chlorophenyl phenyl ether	0.559	0.594	0.564	0.613	0.626
Fluorene	1.431	1.446	1.442	1.457	1.336
4-Nitroaniline	0.447	0.349	0.326	0.449	0.394

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: Contract:  
Lab Code: Case No.: SAS No.: SDG No.: 0802326  
Instrument ID: SV4 Calibration Date(s): 02/18/08 02/18/08  
Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1456 1707

LAB FILE ID: RF0.2: 04 RF0.5: 05 RF1: 06  
RF2.5: 07 RF5: 08

COMPOUND	RF0.2	RF0.5	RF1	RF2.5	RF5
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	0.292	0.158	0.201	0.218	0.214
N-Nitrosodiphenylamine	1.043	0.964	0.894	0.970	0.895
4-Bromophenyl-phenylether	0.370	0.197	0.266	0.306	0.285
Hexachlorobenzene	0.355	0.298	0.301	0.315	0.330
Pentachlorophenol	0.170	0.137	0.171	0.194	0.196
Phenanthrene	1.362	1.212	1.134	1.160	1.021
Anthracene	1.337	1.157	1.157	1.207	1.024
Carbazole	1.203	0.937	1.045	1.131	0.972
Di-n-butylphthalate	1.667	1.340	1.393	1.559	1.333
Fluoranthene	1.200	0.962	1.021	1.101	0.984
Pyrene	1.340	1.466	1.226	1.340	1.270
Butylbenzylphthalate	0.722	0.815	0.777	0.805	0.810
Benzo(a)Anthracene	1.148	1.143	1.063	1.237	1.172
3,3'-Dichlorobenzidine	0.463	0.495	0.400	0.506	0.478
bis(2-ethylhexyl)phthalate	1.184	1.239	1.006	1.096	1.155
Chrysene	1.060	1.130	1.198	1.195	1.152
Di-n-octylphthalate	1.796	1.721	1.782	1.900	1.832
Benzo(b)fluoranthene	1.031	0.992	1.167	1.242	1.142
Benzo(k)fluoranthene	1.086	1.251	1.162	1.254	1.197
Benzo(a)pyrene	1.058	0.948	1.071	1.116	1.056
Indeno(1,2,3-cd)pyrene	0.929	0.902	0.937	1.049	1.005
Dibenzo(a,h)anthracene	0.881	0.972	0.972	1.110	1.049
Benzo(g,h,i)perylene	0.989	1.035	1.037	1.163	1.092
Acetophenone	0.465	0.485	0.477	0.472	0.487
Caprolactam	0.119	0.132	0.124	0.132	0.123
1,1'-Biphenyl	1.480	1.515	1.700	1.612	1.460
Benzaldehyde	1.174	0.902	0.927	1.051	1.090
Atrazine	0.260	0.256	0.306	0.301	0.284
=====	=====	=====	=====	=====	=====
Phenol-d6	1.333	1.477	1.456	1.737	1.799
2-Fluorophenol	1.344	1.098	1.114	1.115	1.334
Nitrobenzene-d5	0.384	0.350	0.397	0.353	0.383
2-Fluorobiphenyl	1.320	1.335	1.536	1.490	1.313
2,4,6-Tribromophenol	0.237	0.167	0.217	0.211	0.194
4-Terphenyl-d14	0.856	0.766	0.759	0.899	0.892

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802326

Instrument ID: SV4

Calibration Date(s): 02/18/08 02/18/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1456 1707

LAB FILE ID: RF7.5: 09

RF10: 10

COMPOUND	RF7.5	RF10	CURVE	COEFFICIENT A1	%RSD OR R^2
Phenol	1.477	1.496	AVRG	1.55237249	11.2
Bis(2-chloroethyl) ether	1.490	1.467	AVRG	1.43577916	13.5
2-Chlorophenol	1.299	1.258	AVRG	1.26349376	10.2
2-Methylphenol	1.230	1.261	AVRG	1.27276875	13.3
bis(2-Chloroisopropyl) ether	0.663	0.664	AVRG	0.69920313	18.4
3&4-Methylphenol	1.420	1.441	AVRG	1.42378532	6.5
N-Nitroso-di-n-propylamine	0.873	0.908	AVRG	0.97702089	16.9
Hexachloroethane	0.535	0.590	AVRG	0.58130953	6.4
Nitrobenzene	0.366	0.342	AVRG	0.36439188	4.4
Isophorone	0.555	0.527	AVRG	0.60137266	13.8
2-Nitrophenol	0.192	0.198	AVRG	0.20840540	10.6
2,4-Dimethylphenol	0.333	0.300	AVRG	0.31135015	10.3
Bis(2-chloroethoxy) methane	0.378	0.359	AVRG	0.40268100	13.2
2,4-Dichlorophenol	0.262	0.247	AVRG	0.27241001	7.9
Naphthalene	0.934	0.802	AVRG	0.98456767	10.3
4-Chloroaniline	0.430	0.398	AVRG	0.43750279	5.0
Hexachlorobutadiene	0.150	0.137	AVRG	0.14414966	7.6
4-Chloro-3-Methylphenol	0.292	0.276	AVRG	0.28473151	4.9
2-Methylnaphthalene	0.538	0.485	AVRG	0.55184946	7.2
Hexachlorocyclopentadiene	0.361	0.348	AVRG	0.37783877	7.4
2,4,6-Trichlorophenol	0.336	0.346	AVRG	0.37841589	9.8
2,4,5-Trichlorophenol	0.381	0.374	AVRG	0.38989390	11.5
2-Chloronaphthalene	1.027	0.975	AVRG	1.10095914	9.4
2-Nitroaniline	0.348	0.337	AVRG	0.36989139	5.6
Dimethylphthalate	1.228	1.105	AVRG	1.31374176	10.4
Acenaphthylene	1.713	1.514	AVRG	1.94842423	14.1
2,6-Dinitrotoluene	0.329	0.321	AVRG	0.33345904	13.1
3-Nitroaniline	0.351	0.373	AVRG	0.40604530	9.3
Acenaphthene	1.055	0.978	AVRG	1.13641941	9.0
2,4-Dinitrophenol	0.220	0.238	AVRG	0.21504048	12.1
Dibenzofuran	1.429	1.301	AVRG	1.58285406	10.9
4-Nitrophenol	0.190	0.196	AVRG	0.19763210	17.1
2,4-Dinitrotoluene	0.433	0.396	AVRG	0.43739851	9.6
Diethylphthalate	1.262	1.172	AVRG	1.44137385	13.2
4-Chlorophenyl phenyl ether	0.552	0.539	AVRG	0.57827942	5.7
Fluorene	1.252	1.166	AVRG	1.36140900	8.4
4-Nitroaniline	0.375	0.371	AVRG	0.38749355	12.1

FORM VI SV



FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802326

Instrument ID: SV4

Calibration Date(s): 02/18/08 02/18/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1456 1707

LAB FILE ID: RF7.5: 09

RF10: 10

COMPOUND	RF7.5	RF10	CURVE	COEFFICIENT A1	%RSD OR R^2
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	0.217	0.205	AVRG	0.21499811	18.4
N-Nitrosodiphenylamine	0.868	0.779	AVRG	0.91594993	9.3
4-Bromophenyl-phenylether	0.284	0.251	AVRG	0.27981927	19.0
Hexachlorobenzene	0.305	0.283	AVRG	0.31252239	7.6
Pentachlorophenol	0.189	0.178	AVRG	0.17641698	11.5
Phenanthrene	1.016	0.886	AVRG	1.11288714	13.9
Anthracene	1.036	0.868	AVRG	1.11228630	13.6
Carbazole	0.956	0.833	AVRG	1.01112107	12.4
Di-n-butylphthalate	1.336	1.088	AVRG	1.38808587	13.3
Fluoranthene	1.021	0.868	AVRG	1.02234608	10.3
Pyrene	1.238	1.084	AVRG	1.28073938	9.3
Butylbenzylphthalate	0.766	0.742	AVRG	0.77666486	4.6
Benzo(a)Anthracene	1.133	1.060	AVRG	1.13655748	5.4
3,3'-Dichlorobenzidine	0.482	0.446	AVRG	0.46697209	7.6
bis(2-ethylhexyl)phthalate	1.066	1.011	AVRG	1.10814417	8.0
Chrysene	1.113	0.977	AVRG	1.11794146	7.0
Di-n-octylphthalate	1.712	1.721	AVRG	1.78058429	3.9
Benzo(b)fluoranthene	1.059	1.143	AVRG	1.11095640	7.8
Benzo(k)fluoranthene	1.179	1.125	AVRG	1.17899987	5.2
Benzo(a)pyrene	1.000	1.030	AVRG	1.03991573	5.2
Indeno(1,2,3-cd)pyrene	0.982	1.018	AVRG	0.97460842	5.5
Dibenzo(a,h)anthracene	0.996	1.064	AVRG	1.00622547	7.5
Benzo(g,h,i)perylene	1.002	1.068	AVRG	1.05510709	5.6
Acetophenone	0.447	0.425	AVRG	0.46543254	4.8
Caprolactam	0.122	0.122	AVRG	0.12481386	4.2
1,1'-Biphenyl	1.346	1.233	AVRG	1.47791741	10.6
Benzaldehyde	0.894	0.947	AVRG	0.99779091	10.8
Atrazine	0.268	0.266	AVRG	0.27738086	7.2
=====	=====	=====	=====	=====	=====
Phenol-d6	1.554	1.571	AVRG	1.56135306	10.4
2-Fluorophenol	1.135	1.097	AVRG	1.17676838	9.5
Nitrobenzene-d5	0.358	0.339	AVRG	0.36624628	5.9
2-Fluorobiphenyl	1.220	1.126	AVRG	1.33424549	10.7
2,4,6-Tribromophenol	0.190	0.191	AVRG	0.20091324	11.3
4-Terphenyl-d14	0.861	0.815	AVRG	0.83562888	6.8

FORM VI SV

FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802326

Instrument ID: SV4 Calibration Date: 02/20/08 Time: 1548

Lab File ID: 02 Init. Calib. Date(s): 02/18/08 02/18/08

Init. Calib. Times: 1456 1707

GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	RRF	RRF2.5	MIN RRF	%D	MAX %D
Phenol	1.552	1.513	0.8	2.5	20.0
Bis(2-chloroethyl) ether	1.436	1.196	0.7	16.7	20.0
2-Chlorophenol	1.264	1.199	0.8	5.1	20.0
2-Methylphenol	1.273	1.265	0.7	0.6	20.0
bis(2-Chloroisopropyl) ether	0.699	0.675	0.01	3.4	20.0
3&4-Methylphenol	1.424	1.292	0.6	9.3	20.0
N-Nitroso-di-n-propylamine	0.977	0.870	0.5	11.0	20.0
Hexachloroethane	0.581	0.535	0.3	7.9	20.0
Nitrobenzene	0.364	0.350	0.2	3.8	20.0
Isophorone	0.601	0.544	0.4	9.5	20.0
2-Nitrophenol	0.208	0.190	0.1	8.6	20.0
2,4-Dimethylphenol	0.311	0.320	0.2	2.9	20.0
Bis(2-chloroethoxy) methane	0.403	0.380	0.3	5.7	20.0
2,4-Dichlorophenol	0.272	0.256	0.2	5.9	20.0
Naphthalene	0.984	0.963	0.7	2.1	20.0
4-Chloroaniline	0.438	0.418	0.01	4.6	20.0
Hexachlorobutadiene	0.144	0.162	0.01	12.5	20.0
4-Chloro-3-Methylphenol	0.285	0.280	0.2	1.8	20.0
2-Methylnaphthalene	0.552	0.520	0.4	5.8	20.0
Hexachlorocyclopentadiene	0.378	0.401	0.05	6.1	20.0
2,4,6-Trichlorophenol	0.378	0.362	0.2	4.2	20.0
2,4,5-Trichlorophenol	0.390	0.415	0.2	6.4	20.0
2-Chloronaphthalene	1.101	1.205	0.8	9.4	20.0
2-Nitroaniline	0.370	0.333	0.01	10.0	20.0
Dimethylphthalate	1.314	1.289	0.01	1.9	20.0
Acenaphthylene	1.948	1.823	0.9	6.4	20.0
2,6-Dinitrotoluene	0.333	0.329	0.2	1.2	20.0
3-Nitroaniline	0.406	0.397	0.01	2.2	20.0
Acenaphthene	1.136	1.107	0.9	2.6	20.0
2,4-Dinitrophenol	0.215	0.199	0.01	7.4	20.0
Dibenzofuran	1.583	1.555	0.8	1.8	20.0
4-Nitrophenol	0.198	0.178	0.01	10.1	20.0
2,4-Dinitrotoluene	0.437	0.389	0.2	11.0	20.0
Diethylphthalate	1.441	1.326	0.01	8.0	20.0
4-Chlorophenyl phenyl ether	0.578	0.590	0.4	2.1	20.0
Fluorene	1.361	1.277	0.9	6.2	20.0
4-Nitroaniline	0.387	0.390	0.01	0.8	20.0

FORM VII SV

FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_  
 Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802326  
 Instrument ID: SV4 Calibration Date: 02/20/08 Time: 1548  
 Lab File ID: 02 Init. Calib. Date(s): 02/18/08 02/18/08  
 Init. Calib. Times: 1456 1707  
 GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	RRF	RRF2.5	MIN RRF	%D	MAX %D
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	0.215	0.194	0.01	9.8	20.0
N-Nitrosodiphenylamine	0.916	0.880	0.01	3.9	20.0
4-Bromophenyl-phenylether	0.280	0.280	0.01	0.0	20.0
Hexachlorobenzene	0.312	0.273	0.1	12.5	20.0
Pentachlorophenol	0.176	0.174	0.05	1.1	20.0
Phenanthrene	1.113	1.142	0.7	2.6	20.0
Anthracene	1.112	1.109	0.7	0.3	20.0
Carbazole	1.011	0.995	0.01	1.6	20.0
Di-n-butylphthalate	1.388	1.349	0.01	2.8	20.0
Fluoranthene	1.022	1.055	0.6	3.2	20.0
Pyrene	1.280	1.305	0.6	2.0	20.0
Butylbenzylphthalate	0.777	0.742	0.01	4.5	20.0
Benzo (a) Anthracene	1.136	1.166	0.8	2.6	20.0
3,3'-Dichlorobenzidine	0.467	0.492	0.01	5.4	20.0
bis (2-ethylhexyl) phthalate	1.108	1.055	0.01	4.8	20.0
Chrysene	1.118	1.145	0.7	2.4	20.0
Di-n-octylphthalate	1.780	1.663	0.01	6.6	20.0
Benzo (b) fluoranthene	1.111	1.102	0.7	0.8	20.0
Benzo (k) fluoranthene	1.179	1.222	0.7	3.6	20.0
Benzo (a) pyrene	1.040	1.064	0.7	2.3	20.0
Indeno (1,2,3-cd) pyrene	0.974	0.979	0.5	0.5	20.0
Dibenzo (a,h) anthracene	1.006	1.030	0.4	2.4	20.0
Benzo (g,h,i) perylene	1.055	0.988	0.5	6.4	20.0
Acetophenone	0.465	0.457	0.01	1.7	20.0
Caprolactam	0.125	0.115	0.01	8.0	20.0
1,1'-Biphenyl	1.478	1.398	0.01	5.4	20.0
Benzaldehyde	0.998	0.993	0.01	0.5	20.0
Atrazine	0.277	0.276	0.01	0.4	20.0
=====	=====	=====	=====	=====	=====
Phenol-d6	1.561	1.489	0.01	4.6	20.0
2-Fluorophenol	1.177	1.135	0.01	3.6	20.0
Nitrobenzene-d5	0.366	0.313	0.01	14.5	20.0
2-Fluorobiphenyl	1.334	1.325	0.01	0.7	20.0
2,4,6-Tribromophenol	0.201	0.206	0.01	2.5	20.0
4-Terphenyl-d14	0.835	0.916	0.01	9.7	20.0

FORM VII SV

## PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53

(mm)

Calibration Time(s): 1519

1810

LAB FILE ID:

RF0.005: 006

RF0.01: 007

RF0.02: 008

RF0.04: 009

RF0.06: 010

RF0.08: 011

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
alpha-BHC	4703	9952	20806	49102	76316	112985
gamma-BHC	4917	10317	21430	49512	75715	110507
Heptachlor	1337400.0	1355800.0	1326400.0	1403625.0	1369433.3	1452975.0
Endosulfan I	315400.00	320900.00	310700.00	319900.00	309400.00	322887.50
Dieldrin	1055000.0	1090600.0	1090375.0	1183612.5	1173325.0	1253556.3
Endrin	797400.00	797850.00	802650.00	867850.00	849391.67	916862.50
4,4'-DDD	738000.00	767900.00	801300.00	889762.50	889050.00	961175.00
4,4'-DDT	946100.00	991500.00	1004225.0	1085512.5	1072158.3	1147662.5
Methoxychlor	639420.00	643240.00	623200.00	617895.00	584006.67	604390.00
Tetrachloro-m-xylene	1156200.0	1163100.0	1130500.0	1145300.0	1082450.0	1118837.5
Decachlorobiphenyl	1742300.0	1717600.0	1596650.0	1531712.5	1418600.0	1451331.3

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53 (mm)

Calibration Time(s): 1519

1810

COMPOUND	CURVE	COEFFICIENTS			%RSD	MAX %RSD
		A0	A1	A2	OR R^2	OR R^2
=====	=====	=====	=====	=====	=====	=====
alpha-BHC	2ORDR	1.213e-003	8.968e-007	-1.76e-012	0.9994761	0.9900000
gamma-BHC	2ORDR	9.75e-004	8.859e-007	-1.53e-012	0.9994627	0.9900000
Heptachlor	AVRG		1374272.22		3.424	20.000
Endosulfan I	AVRG		316531.250		1.770	20.000
Dieldrin	AVRG		1141078.13		6.561	20.000
Endrin	AVRG		838667.361		5.780	20.000
4,4'-DDD	AVRG		841197.917		10.179	20.000
4,4'-DDT	AVRG		1041193.06		7.076	20.000
Methoxychlor	AVRG		618691.944		3.586	20.000
=====	=====	=====	=====	=====	=====	=====
Tetrachloro-m-xylene	AVRG		1132731.25		2.606	20.000
Decachlorobiphenyl	AVRG		1576365.63		8.530	20.000

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53

(mm)

Calibration Time(s): 1844

2135

LAB FILE ID:

RF0.005: 012

RF0.01: 013.

RF0.02: 014

RF0.04: 015

RF0.06: 016

RF0.08: 017

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
=====	=====	=====	=====	=====	=====	=====
beta-BHC	779600.00	682900.00	819250.00	774400.00	747550.00	757150.00
delta-BHC	4316	7873	20636	43136	67306	96565
Aldrin	1224000.0	1076600.0	1321850.0	1292725.0	1286950.0	1340325.0
Heptachlor epoxide	1407600.0	1155900.0	1415250.0	1299000.0	1260716.7	1287600.0
gamma-Chlordane	1396800.0	1205000.0	1430100.0	1346200.0	1308966.7	1337712.5
alpha-Chlordane	1371200.0	1193800.0	1412950.0	1339425.0	1321066.7	1346712.5
4,4'-DDE	303600.00	272750.00	343575.00	336837.50	328391.67	334500.00
Endosulfan II	1165100.0	1008900.0	1218525.0	1149975.0	1121858.3	1143275.0
Endrin aldehyde	1103800.0	929950.00	1104450.0	994512.50	953983.33	953756.25
Endosulfan sulfate	1034600.0	890200.00	1056650.0	998475.00	962850.00	988568.75
Endrin ketone	1211700.0	1052500.0	1293750.0	1232637.5	1197025.0	1225406.3

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53 (mm)

Calibration Time(s): 1844

2135

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2	MAX %RSD OR R^2
		A0	A1	A2		
beta-BHC	AVRG		760141.667		5.944	20.000
delta-BHC	2ORDR	1.36e-003	9.701e-007	-1.59e-012	0.9994617	0.9900000
Aldrin	AVRG		1257075.00		7.709	20.000
Heptachlor epoxide	AVRG		1304344.44		7.450	20.000
gamma-Chlordane	AVRG		1337463.19		5.843	20.000
alpha-Chlordane	AVRG		1330859.03		5.580	20.000
4,4'-DDE	AVRG		319942.361		8.412	20.000
Endosulfan II	AVRG		1134605.56		6.138	20.000
Endrin aldehyde	AVRG		1006742.01		7.771	20.000
Endosulfan sulfate	AVRG		988557.292		5.931	20.000
Endrin ketone	AVRG		1202169.79		6.693	20.000

FORM VI PEST

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i      Injection Date: 24-FEB-2008 10:40  
Lab File ID: 040.D      Init. Cal. Date(s): 23-FEB-2008    23-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    15:19      21:35  
Lab Sample ID: INDB-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRFO.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
14 beta-BHC	760142	778350	778350	0.010	-2.39539	15.00000	Averaged
15 delta-BHC	0.02000	0.01997	991700	0.010	0.12774	15.00000	Quadratic
17 Aldrin	1257075	1236900	1236900	0.010	1.60492	15.00000	Averaged
18 Heptachlor epoxide	1304344	1335600	1335600	0.010	-2.39627	15.00000	Averaged
19 gamma-Chlordane	1337463	1352350	1352350	0.010	-1.11306	15.00000	Averaged
10 alpha-Chlordane	1330859	1307200	1307200	0.010	1.77773	15.00000	Averaged
12 4,4'-DDE	319942	334425	334425	0.010	-4.52664	15.00000	Averaged
16 Endosulfan II	1134606	1188675	1188675	0.010	-4.76548	15.00000	Averaged
18 Endrin aldehyde	1006742	1101675	1101675	0.010	-9.42972	15.00000	Averaged
19 Endosulfan sulfate	988557	1088675	1088675	0.010	-10.12766	15.00000	Averaged
21 Endrin ketone	1202170	1347550	1347550	0.010	-12.09315	15.00000	Averaged



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 11:53  
 Lab File ID: 042.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDA-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1 Tetrachloro-m-xylene	1132731	1096050	1096050	0.010	3.23830	15.00000	Averaged
2 alpha-BHC	0.02000	0.01844	999600	0.010	7.80259	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01877	1041650	0.010	6.17493	15.00000	Quadratic
6 Heptachlor	1374272	1291200	1291200	0.010	6.04482	15.00000	Averaged
11 Endosulfan I	316531	298450	298450	0.010	5.71231	15.00000	Averaged
13 Dieldrin	1141078	1056575	1056575	0.010	7.40555	15.00000	Averaged
14 Endrin	838667	911100	911100	0.010	-8.63664	15.00000	Averaged
15 4,4'-DDD	841198	797375	797375	0.010	5.20958	15.00000	Averaged
17 4,4'-DDT	1041193	1025400	1025400	0.010	1.51682	15.00000	Averaged
20 Methoxychlor	618692	670130	670130	0.010	-8.31400	15.00000	Averaged
25 Decachlorobiphenyl	1576366	1769750	1769750	0.010	-12.26774	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i      Injection Date: 24-FEB-2008 23:33  
Lab File ID: 061.D      Init. Cal. Date(s): 23-FEB-2008    23-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    15:19      21:35  
Lab Sample ID: INDA-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL	MIN	RRF	%D / %DRIFT	MAX	%D / %DRIFT	CURVE TYPE
1 Tetrachloro-m-xylene	1132731	1011800	1011800	0.010	10.67608	15.00000	Averaged		
2 alpha-BHC	0.02000	0.01700	913050	0.010	14.98259	15.00000	Quadratic		
3 gamma-BHC	0.02000	0.01724	949050	0.010	13.81305	15.00000	Quadratic		
6 Heptachlor	1374272	1170350	1170350	0.010	14.83856	15.00000	Averaged		
11 Endosulfan I	316531	273550	273550	0.010	13.57883	15.00000	Averaged		
13 Dieldrin	1141078	977275	977275	0.010	14.35512	15.00000	Averaged		
14 Endrin	638667	786800	786800	0.010	6.18450	15.00000	Averaged		
15 4,4'-DDD	841198	728525	728525	0.010	13.39434	15.00000	Averaged		
17 4,4'-DDT	1041193	933500	933500	0.010	10.34324	15.00000	Averaged		
20 Methoxychlor	618692	617625	617625	0.010	0.17245	15.00000	Averaged		
25 Decachlorobiphenyl	1576366	1544975	1544975	0.010	1.99133	15.00000	Averaged		

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 25-FEB-2008 00:08  
 Lab File ID: 062.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDB-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
14 beta-BHC	760142	686100	686100	0.010	9.74051	15.00000	Averaged
15 delta-BHC	0.02000	0.01758	860250	0.010	12.10447	15.00000	Quadratic
17 Aldrin	1257075	1096100	1096100	0.010	12.80552	15.00000	Averaged
18 Heptachlor epoxide	1304344	1192150	1192150	0.010	8.60160	15.00000	Averaged
19 gamma-Chlordane	1337463	1207300	1207300	0.010	9.73210	15.00000	Averaged
110 alpha-Chlordane	1330859	1173750	1173750	0.010	11.80508	15.00000	Averaged
112 4,4'-DDE	319942	293825	293825	0.010	8.16315	15.00000	Averaged
116 Endosulfan II	1134606	1058150	1058150	0.010	6.73851	15.00000	Averaged
118 Endrin aldehyde	1006742	973625	973625	0.010	3.28952	15.00000	Averaged
119 Endosulfan sulfate	988557	983800	983800	0.010	0.48124	15.00000	Averaged
121 Endrin ketone	1202170	1203475	1203475	0.010	-0.10857	15.00000	Averaged

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 1519

1810

LAB FILE ID:

RF0.005: 006

RF0.01: 007

RF0.02: 008

RF0.04: 009

RF0.06: 010

RF0.08: 011

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
=====	=====	=====	=====	=====	=====	=====
alpha-BHC	4366	9243	19463	45125	68168	96897
gamma-BHC	4659	9791	20206	45154	67093	94014
Heptachlor	1075800.0	1076200.0	1018500.0	1052350.0	1015966.7	1052237.5
Endosulfan I	245600.00	243300.00	238750.00	248175.00	240500.00	248050.00
Dieldrin	818800.00	828900.00	828575.00	875750.00	846383.33	880200.00
Endrin	555400.00	548800.00	540225.00	567687.50	546191.67	573825.00
4,4'-DDD	597000.00	613300.00	621125.00	653725.00	634558.33	659343.75
4,4'-DDT	711300.00	730350.00	717525.00	734662.50	710008.33	736912.50
Methoxychlor	398160.00	380230.00	348445.00	326115.00	300443.33	306826.25
=====	=====	=====	=====	=====	=====	=====
Tetrachloro-m-xylene	975000.00	961700.00	898100.00	877925.00	815966.67	819412.50
Decachlorobiphenyl	1327300.0	1236550.0	1098100.0	991950.00	897141.67	891937.50

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 1519 1810

COMPOUND	CURVE	COEFFICIENTS			%RSD	MAX %RSD
		A0	A1	A2	OR R <sup>2</sup>	OR R <sup>2</sup>
alpha-BHC	2ORDR	1.336e-003	9.397e-007	-1.31e-012	0.9994175	0.9900000
gamma-BHC	2ORDR	9.163e-004	9.317e-007	-9.41e-013	0.9994792	0.9900000
Heptachlor	AVRG		1048509.03		2.523	20.000
Endosulfan I	AVRG		244062.500		1.604	20.000
Dieldrin	AVRG		846434.722		3.076	20.000
Endrin	AVRG		555354.861		2.346	20.000
4,4'-DDD	AVRG		629842.014		3.818	20.000
4,4'-DDT	AVRG		723459.722		1.656	20.000
Methoxychlor	AVRG		343369.931		11.548	20.000
Tetrachloro-m-xylene	AVRG		891350.694		7.614	20.000
Decachlorobiphenyl	AVRG		1073829.86		16.779	20.000

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 1844

2135

LAB FILE ID:

RF0.005: 012

RF0.01: 013

RF0.02: 014

RF0.04: 015

RF0.06: 016

RF0.08: 017

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
=====	=====	=====	=====	=====	=====	=====
beta-BHC	774400.00	656400.00	754850.00	674025.00	631650.00	620262.50
delta-BHC	4184	7319	19399	39861	60746	84295
Aldrin	1011600.0	880600.00	1062900.0	1024875.0	1002283.3	1016825.0
Heptachlor epoxide	1078600.0	918000.00	1049200.0	974875.00	934800.00	937175.00
gamma-Chlordane	1127800.0	960600.00	1088500.0	998250.00	953516.67	954600.00
alpha-Chlordane	1235600.0	969100.00	1133650.0	1007350.0	954050.00	952775.00
4,4'-DDE	235800.00	213600.00	270650.00	260587.50	248450.00	250243.75
Endosulfan II	922100.00	784900.00	919400.00	845975.00	799233.33	793168.75
Endrin aldehyde	870700.00	711700.00	804750.00	698562.50	654216.67	640612.50
Endosulfan sulfate	767700.00	648600.00	758975.00	700837.50	663850.00	668818.75
Endrin ketone	962900.00	792950.00	965100.00	868362.50	818233.33	818743.75

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 1844 2135

COMPOUND	CURVE	COEFFICIENTS			%RSD	MAX %RSD
		A0	A1	A2	OR R^2	OR R^2
beta-BHC	AVRG		685264.583		9.423	20.000
delta-BHC	2ORDR	1.459e-003	1.007e-006	-8.66e-013	0.9993746	0.9900000
Aldrin	AVRG		999847.222		6.206	20.000
Heptachlor epoxide	AVRG		982108.333		6.789	20.000
gamma-Chlordane	AVRG		1013877.78		7.484	20.000
alpha-Chlordane	AVRG		1042087.50		11.198	20.000
4,4'-DDE	AVRG		246555.208		8.104	20.000
Endosulfan II	AVRG		844129.514		7.468	20.000
Endrin aldehyde	AVRG		730090.278		12.318	20.000
Endosulfan sulfate	AVRG		701463.542		7.261	20.000
Endrin ketone	AVRG		871048.264		8.730	20.000

FORM VI PEST

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 10:40  
Lab File ID: 040.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
Lab Sample ID: INDB-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
4 beta-BHC	685265	712700	712700	0.010	-4.00362	15.00000	Averaged
5 delta-BHC	0.02000	0.01990	930250	0.010	0.50844	15.00000	Quadratic
7 Aldrin	999847	979350	979350	0.010	2.05004	15.00000	Averaged
8 Heptachlor epoxide	982108	1029750	1029750	0.010	-4.85096	15.00000	Averaged
9 gamma-Chlordane	1013878	1023850	1023850	0.010	-0.98357	15.00000	Averaged
10 alpha-Chlordane	1042088	1088450	1088450	0.010	-4.44900	15.00000	Averaged
12 4,4'-DDE	246555	265900	265900	0.010	-7.84603	15.00000	Averaged
16 Endosulfan II	844130	884525	884525	0.010	-4.78546	15.00000	Averaged
18 Endrin aldehyde	730090	791000	791000	0.010	-8.34277	15.00000	Averaged
19 Endosulfan sulfate	701464	771975	771975	0.010	-10.05205	15.00000	Averaged
21 Endrin ketone	871048	976575	976575	0.010	-12.11491	15.00000	Averaged



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 11:53  
Lab File ID: 042.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
Lab Sample ID: INDA-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1 Tetrachloro-m-xylene	891351	872000	872000	0.010	2.17094	15.00000	Averaged
2 alpha-BHC	0.02000	0.01861	943650	0.010	6.96596	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01890	984600	0.010	5.50485	15.00000	Quadratic
6 Heptachlor	1048509	1000250	1000250	0.010	4.60263	15.00000	Averaged
11 Endosulfan I	244063	230350	230350	0.010	5.61844	15.00000	Averaged
13 Dieldrin	846435	802350	802350	0.010	5.20828	15.00000	Averaged
14 Endrin	555355	590900	590900	0.010	-6.40044	15.00000	Averaged
15 4,4'-DDD	629842	576525	576525	0.010	8.46514	15.00000	Averaged
17 4,4'-DDT	723460	711200	711200	0.010	1.69460	15.00000	Averaged
20 Methoxychlor	343370	379375	379375	0.010	-10.48580	15.00000	Averaged
25 Decachlorobiphenyl	1073830	1089975	1089975	0.010	-1.50351	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 23:33  
 Lab File ID: 061.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDA-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1 Tetrachloro-m-xylene	891351	801200	801200	0.010	10.11394	15.00000	Averaged
2 alpha-BHC	0.02000	0.01702	854950	0.010	14.88483	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01710	884300	0.010	14.49731	15.00000	Quadratic
6 Heptachlor	1048509	896700	896700	0.010	14.47856	15.00000	Averaged
11 Endosulfan I	244063	210950	210950	0.010	13.56722	15.00000	Averaged
13 Dieldrin	846435	730575	730575	0.010	13.68797	15.00000	Averaged
14 Endrin	555355	508725	508725	0.010	8.39641	15.00000	Averaged
15 4,4'-DDD	629842	536175	536175	0.010	14.87151	15.00000	Averaged
17 4,4'-DDT	723460	650150	650150	0.010	10.13321	15.00000	Averaged
20 Methoxychlor	343370	350680	350680	0.010	-2.12892	15.00000	Averaged
25 Decachlorobiphenyl	1073830	1034425	1034425	0.010	3.66956	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 25-FEB-2008 00:08  
Lab File ID: 062.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
Lab Sample ID: INDB-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL	MIN	MAX	CURVE TYPE
			RRF0.020	RRF	%D / %DRIFT	%D / %DRIFT
14 beta-BHC	685265	624300	624300	0.010	8.89650	15.00000 Averaged
15 delta-BHC	0.02000	0.01728	796100	0.010	13.61898	15.00000 Quadratic
17 Aldrin	999847	872300	872300	0.010	12.75667	15.00000 Averaged
18 Heptachlor epoxide	982108	898450	898450	0.010	8.51824	15.00000 Averaged
19 gamma-Chlordane	1013878	904200	904200	0.010	10.81765	15.00000 Averaged
10 alpha-Chlordane	1042088	964100	964100	0.010	7.48378	15.00000 Averaged
12 4,4'-DDE	246555	228975	228975	0.010	7.13033	15.00000 Averaged
16 Endosulfan II	844130	779700	779700	0.010	7.63266	15.00000 Averaged
18 Endrin aldehyde	730090	693550	693550	0.010	5.00490	15.00000 Averaged
19 Endosulfan sulfate	701464	689500	689500	0.010	1.70551	15.00000 Averaged
21 Endrin ketone	871048	865125	865125	0.010	0.68002	15.00000 Averaged

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP

ID: 0.50

(mm)

Calibration Time(s): 1704

2048

LAB FILE ID:

RF0.02: 006

RF0.04: 007

RF0.08: 008

RF0.2: 009

RF0.5: 010

RF0.7: 011

COMPOUND	RF0.02	RF0.04	RF0.08	RF0.2	RF0.5	RF0.7
=====	=====	=====	=====	=====	=====	=====
2,4-DB	5108	9719	18353	41322	87879	118108
Dicamba	12307	22969	42954	95072	203285	268904
Dichlorprop	9154	16682	30960	65694	134828	175040
Dalapon	6745	11203	19791	42458	87260	110919
Dinoseb	5342	11986	42389	58458	126744	188628
MCPA	12002	18958	30045	52002	92400	114748
MCPP	6640	11132	18174	32745	58460	72824
2,4,5-TP (Silvex)	7923	14045	28145	67736	154903	206955
2,4,5-T	7840	14982	30069	70942	158635	210003
2,4-D	10207	18232	33189	70147	141447	183884
=====	=====	=====	=====	=====	=====	=====
DCAA	9088	16340	28995	60056	121328	157601

FORM VI HERB

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP ID: 0.50 (mm)

Calibration Time(s): 1704 2048

RF1: 012

COMPOUND	RF1	CURVE	COEFFICIENTS			%RSD OR R <sup>2</sup>	MA
			A0	A1	A2		
2,4-DE	157499	2ORDR	-9.04e-003	4.822e-006	1.01e-011	0.9998403	0
Dicamba	356790	2ORDR	-4.28e-003	1.013e-006	1.126e-012	0.9999391	0
Dichlorprop	228577	2ORDR	-9.79e-003	2.795e-006	7.136e-012	0.9999235	0
Dalapon	147393	2ORDR	-7.33e-003	2.268e-006	8.085e-012	0.9996880	C
Dinoseb	271766	2ORDR	-6.2e-003	9.93e-007	-1.68e-013	0.9932724	C
MCPA	141799	2ORDR	-1.9041304	2.504e-004	3.303e-009	0.9998884	C
MCPP	91657	2ORDR	-2.0604654	4.603e-004	7.178e-009	0.9997430	C
2,4,5-TP (Silvex)	266465	2ORDR	1.51e-003	6.045e-007	1.208e-012	0.9996141	C
2,4,5-T	281777	2ORDR	-4.61e-004	6.635e-007	8.038e-013	0.9999780	C
2,4-D	244226	2ORDR	-1.61e-002	2.855e-006	5.423e-012	0.9996761	C
DCAA	206190	2ORDR	-1.48e-002	3.168e-006	8.563e-012	0.9998612	C

FORM VI HERB

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 24-FEB-2008 10:49  
 Lab File ID: 042.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	CCAL	MIN	MAX	CURVE TYPE
2 DCAA	0.50000	0.53731	258336	0.001	-7.46261	15.00000 Quadratic
1 Dalapon	0.25000	0.27749	376236	0.001	-10.99699	15.00000 Quadratic
3 Dicamba	0.25000	0.26678	863052	0.001	-6.71144	15.00000 Quadratic
4 MCPP	50.00000	51.71683	1205	0.001	-3.43365	15.00000 Quadratic
5 MCPA	50.00000	51.20469	1889	0.001	-2.40938	15.00000 Quadratic
6 Dichlorprop	0.50000	0.52565	281796	0.001	-5.12902	15.00000 Quadratic
7 2,4-D	0.50000	0.51129	289722	0.001	-2.25873	15.00000 Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.13289	1309888	0.001	-6.30811	15.00000 Quadratic
10 2,4,5-T	0.12500	0.12678	1284320	0.001	-1.42146	15.00000 Quadratic
11 2,4-DB	0.50000	0.48285	172760	0.001	3.42934	15.00000 Quadratic
12 Dinoseb	0.12500	0.13366	1154928	0.001	-6.92564	15.00000 Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 24-FEB-2008 22:14  
 Lab File ID: 060.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
2 DCAA	0.50000	0.50678	246880	0.001	-1.35502	15.00000	Quadratic
1 Dalapon	0.25000	0.25245	349412	0.001	-0.97995	15.00000	Quadratic
3 Dicamba	0.25000	0.24917	815640	0.001	0.33341	15.00000	Quadratic
4 MCPP	50.00000	50.52478	1187	0.001	-1.04956	15.00000	Quadratic
5 MCPA	50.00000	45.15155	1747	0.001	9.69690	15.00000	Quadratic
6 Dichlorprop	0.50000	0.50502	273156	0.001	-1.00361	15.00000	Quadratic
7 2,4-D	0.50000	0.53555	300610	0.001	-7.11041	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12710	1263288	0.001	-1.67989	15.00000	Quadratic
10 2,4,5-T	0.12500	0.12805	1295360	0.001	-2.44012	15.00000	Quadratic
11 2,4-DB	0.50000	0.50456	179338	0.001	-0.91216	15.00000	Quadratic
12 Dinoseb	0.12500	0.12716	1099960	0.001	-1.72761	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 25-FEB-2008 03:48  
 Lab File ID: 069.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRF0.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
2 DCAA	0.50000	0.50051	244504	0.001	-0.10237	15.00000	Quadratic
1 Dalapon	0.25000	0.24676	343204	0.001	1.29689	15.00000	Quadratic
3 Dicamba	0.25000	0.24613	807376	0.001	1.54838	15.00000	Quadratic
4 MCPP	50.00000	50.05595	1180	0.001	-0.11190	15.00000	Quadratic
5 MCPA	50.00000	44.58560	1733	0.001	10.82879	15.00000	Quadratic
6 Dichlorprop	0.50000	0.49980	270952	0.001	0.04022	15.00000	Quadratic
7 2,4-D	0.50000	0.53677	301152	0.001	-7.35360	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12556	1250768	0.001	-0.44762	15.00000	Quadratic
10 2,4,5-T	0.12500	0.12695	1285800	0.001	-1.55788	15.00000	Quadratic
11 2,4-DB	0.50000	0.50242	178692	0.001	-0.48386	15.00000	Quadratic
12 Dinoseb	0.12500	0.12606	1090704	0.001	-0.85107	15.00000	Quadratic



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 26-FEB-2008 08:37  
 Lab File ID: 073.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	CCAL	RRF0.500	MIN	MAX	CURVE TYPE
2 DCAA	0.50000	0.55554	265074	0.001	-11.10735	15.00000	Quadratic
1 Dalapon	0.25000	0.28400	383084	0.001	-13.60089	15.00000	Quadratic
3 Dicamba	0.25000	0.27260	878536	0.001	-9.03960	15.00000	Quadratic
4 MCPP	50.00000	53.68835	1234	0.001	-7.37670	15.00000	Quadratic
5 MCPA	50.00000	51.36391	1893	0.001	-2.72783	15.00000	Quadratic
6 Dichlorprop	0.50000	0.54634	290356	0.001	-9.26877	15.00000	Quadratic
7 2,4-D	0.50000	0.54601	305262	0.001	-9.20294	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.13854	1354808	0.001	-10.83156	15.00000	Quadratic
10 2,4,5-T	0.12500	0.13688	1371176	0.001	-9.50187	15.00000	Quadratic
11 2,4-DB	0.50000	0.52682	186014	0.001	-5.36301	15.00000	Quadratic
12 Dinoseb	0.12500	0.13985	1207408	0.001	-11.87655	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 26-FEB-2008 11:21  
 Lab File ID: 077.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRE / AMOUNT	RFO.500	CCAL RREFO.500	MIN RRE	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
9 2 DCAA	0.50000	0.52550	253930	0.001	-5.10032	15.00000	Quadratic
1 Dalapon	0.25000	0.27362	372140	0.001	-9.44858	15.00000	Quadratic
13 Dicamba	0.25000	0.25620	834684	0.001	-2.48109	15.00000	Quadratic
14 MCPP	50.00000	49.41464	1170	0.001	1.17072	15.00000	Quadratic
15 MCPA	50.00000	44.62263	1734	0.001	10.75473	15.00000	Quadratic
16 Dichlorprop	0.50000	0.50196	271866	0.001	-0.39223	15.00000	Quadratic
17 2,4-D	0.50000	0.51874	293078	0.001	-3.74731	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12844	1274112	0.001	-2.74906	15.00000	Quadratic
110 2,4,5-T	0.12500	0.12864	1300480	0.001	-2.91338	15.00000	Quadratic
111 2,4-DB	0.50000	0.48669	173928	0.001	2.66165	15.00000	Quadratic
112 Dinoseb	0.12500	0.12678	1096712	0.001	-1.42007	15.00000	Quadratic

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP2 ID: 0.42 (mm)

Calibration Time(s): 1704

2048

LAB FILE ID:

RF0.02: 006

RF0.04: 007

RF0.08: 008

RF0.2: 009

RF0.5: 010

RF0.7: 011

COMPOUND	RF0.02	RF0.04	RF0.08	RF0.2	RF0.5	RF0.7
=====	=====	=====	=====	=====	=====	=====
2,4-DB	4429	8316	15774	36286	80830	109256
Dicamba	9653	18320	36038	85536	195927	266691
Dichlorprop	8187	14910	28154	62007	133922	177222
Dalapon	4566	9433	16118	36897	81288	104733
Dinoseb	2094	7777	16880	46589	110909	159057
MCPA	10749	16922	27448	49512	89522	112269
MCPP	6622	10361	17168	31016	55789	70470
2,4,5-TP (Silvex)	5684	11127	23049	59599	147258	203220
2,4,5-T	6330	12148	24753	61099	146782	200264
2,4-D	13150	23359	43061	93050	201157	267861
=====	=====	=====	=====	=====	=====	=====
DCAA	7653	14328	26178	55097	116119	154115
=====	=====	=====	=====	=====	=====	=====

FORM VI HERB

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP2 ID: 0.42 (mm)

Calibration Time(s): 1704 2048

RF1: 012

COMPOUND	RF1	CURVE	COEFFICIENTS			%RSD OR R^2	MA
			A0	A1	A2		
=====	=====	=====	=====	=====	=====	=====	==
2,4-DB	149047	2ORDR	-8.53e-003	5.629e-006	7.697e-012	0.9999219	0
Dicamba	364266	2ORDR	-2.05e-003	1.163e-006	5.934e-013	0.9999696	0
Dichlorprop	236311	2ORDR	-9.11e-003	3.138e-006	4.815e-012	0.9999453	0
Dalapon	143839	2ORDR	-5.61e-003	2.749e-006	5.455e-012	0.9995201	0
Dinoseb	223767	2ORDR	1.848e-003	1.069e-006	1.739e-013	0.9997660	0
MCPA	142230	2ORDR	-2.6028993	3.368e-004	2.724e-009	0.9997388	0
MCPP	89670	2ORDR	-2.8035158	5.661e-004	6.533e-009	0.9995755	0
2,4,5-TP (Silvex)	281496	2ORDR	1.113e-003	7.94e-007	3.171e-013	0.9999785	C
2,4,5-T	273205	2ORDR	5.073e-004	7.71e-007	5.169e-013	0.9999833	C
2,4-D	355303	2ORDR	-1.07e-002	2.093e-006	2.116e-012	0.9999484	C
=====	=====	=====	=====	=====	=====	=====	==
DCAA	206441	2ORDR	-1.55e-002	3.715e-006	5.894e-012	0.9998071	C

FORM VI HERB

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i      Injection Date: 24-FEB-2008 10:49  
Lab File ID: 042.D      Init. Cal. Date(s): 18-NOV-2003    21-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    10:47      20:48  
Lab Sample ID: HSTD-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	REF0.500	CCAL	MIN	MAX	CURVE TYPE
5 2 DCAA	0.50000	0.50662	236670	0.001	-1.32485	15.00000 Quadratic
1 Dalapon	0.25000	0.26306	335176	0.001	-5.22292	15.00000 Quadratic
3 Dicamba	0.25000	0.25417	799872	0.001	-1.66928	15.00000 Quadratic
4 MCPP	50.00000	47.66807	1093	0.001	4.66385	15.00000 Quadratic
5 MCPA	50.00000	51.24477	1835	0.001	-2.48954	15.00000 Quadratic
6 Dichlorprop	0.50000	0.50458	271014	0.001	-0.91575	15.00000 Quadratic
7 2,4-D	0.50000	0.47952	391116	0.001	4.09563	15.00000 Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12382	1168224	0.001	0.94184	15.00000 Quadratic
10 2,4,5-T	0.12500	0.11865	1120576	0.001	5.08372	15.00000 Quadratic
11 2,4-DB	0.50000	0.49537	161254	0.001	0.92692	15.00000 Quadratic
12 Dinoseb	0.12500	0.13953	1009328	0.001	-11.62198	15.00000 Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i      Injection Date: 24-FEB-2008 22:14  
Lab File ID: 060.D      Init. Cal. Date(s): 18-NOV-2003    21-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    10:47      20:48  
Lab Sample ID: HSTD-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	RRF0.500	CCAL	MIN	MAX	CURVE TYPE
2 DCAA	0.50000	0.51087	238330	0.001	-2.17386	15.00000	Quadratic
1 Dalapon	0.25000	0.26458	336836	0.001	-5.83142	15.00000	Quadratic
3 Dicamba	0.25000	0.25506	802416	0.001	-2.02553	15.00000	Quadratic
4 MCPP	50.00000	50.63049	1139	0.001	-1.26098	15.00000	Quadratic
5 MCPA	50.00000	50.03380	1806	0.001	-0.06760	15.00000	Quadratic
6 Dichlorprop	0.50000	0.51422	275344	0.001	-2.84426	15.00000	Quadratic
7 2,4-D	0.50000	0.51958	418276	0.001	-3.91509	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12956	1219832	0.001	-3.64438	15.00000	Quadratic
10 2,4,5-T	0.12500	0.13334	1247760	0.001	-6.66846	15.00000	Quadratic
11 2,4-DB	0.50000	0.51984	168350	0.001	-3.96764	15.00000	Quadratic
12 Dinoseb	0.12500	0.13986	1011744	0.001	-11.89094	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i      Injection Date: 25-FEB-2008 03:48  
Lab File ID: 069.D      Init. Cal. Date(s): 18-NOV-2003    21-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    10:47      20:48  
Lab Sample ID: HSTD-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	CCAL	MIN	MAX	CURVE TYPE
				RRF %D / %DRIFT	%D / %DRIFT	
1\$ 2 DCAA	0.50000	0.50723	236906	0.001	-1.44545	15.00000 Quadratic
1 Dalapon	0.25000	0.25955	331336	0.001	-3.81819	15.00000 Quadratic
13 Dicamba	0.25000	0.25329	797344	0.001	-1.31546	15.00000 Quadratic
14 MCPP	50.00000	50.43933	1136	0.001	-0.87866	15.00000 Quadratic
15 MCPA	50.00000	48.48593	1769	0.001	3.02814	15.00000 Quadratic
16 Dichlorprop	0.50000	0.50973	273328	0.001	-1.94524	15.00000 Quadratic
17 2,4-D	0.50000	0.51858	417610	0.001	-3.71679	15.00000 Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12883	1213336	0.001	-3.06594	15.00000 Quadratic
10 2,4,5-T	0.12500	0.13288	1243840	0.001	-6.30311	15.00000 Quadratic
11 2,4-DB	0.50000	0.51513	166990	0.001	-3.02656	15.00000 Quadratic
12 Dinoseb	0.12500	0.13905	1005904	0.001	-11.24085	15.00000 Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i      Injection Date: 26-FEB-2008 08:37  
Lab File ID: 073.D      Init. Cal. Date(s): 18-NOV-2003    21-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    10:47      20:48  
Lab Sample ID: HSTD-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	CCAL	MIN	MAX	CURVE TYPE
1\$ 2 DCAA	0.50000	0.51011	238032	0.001	-2.02133	15.00000 Quadratic
1 Dalapon	0.25000	0.26716	339644	0.001	-6.86244	15.00000 Quadratic
13 Dicamba	0.25000	0.25492	802008	0.001	-1.96839	15.00000 Quadratic
14 MCPP	50.00000	46.82714	1080	0.001	6.34573	15.00000 Quadratic
15 MCPA	50.00000	55.40108	1933	0.001	-10.80216	15.00000 Quadratic
16 Dichlorprop	0.50000	0.51088	273848	0.001	-2.17695	15.00000 Quadratic
17 2,4-D	0.50000	0.49706	403076	0.001	0.58731	15.00000 Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12767	1202904	0.001	-2.13772	15.00000 Quadratic
10 2,4,5-T	0.12500	0.12640	1187960	0.001	-1.11672	15.00000 Quadratic
11 2,4-DB	0.50000	0.49605	161454	0.001	0.78950	15.00000 Quadratic
12 Dinoseb	0.12500	0.14025	1014512	0.001	-12.19912	15.00000 Quadratic



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i      Injection Date: 26-FEB-2008 11:21  
Lab File ID: 077.D      Init. Cal. Date(s): 18-NOV-2003      21-FEB-2008  
Analysis Type: WATER      Init. Cal. Times: 10:47      20:48  
Lab Sample ID: HSTD-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL	MIN	MAX	CURVE TYPE
5 2 DCAA	0.50000	0.51109	238418	0.001	-2.21891	15.00000 Quadratic
1 Dalapon	0.25000	0.26745	339960	0.001	-6.97860	15.00000 Quadratic
3 Dicamba	0.25000	0.25427	800152	0.001	-1.70848	15.00000 Quadratic
4 MCPP	50.00000	49.40591	1120	0.001	1.18818	15.00000 Quadratic
5 MCPA	50.00000	52.36002	1862	0.001	-4.72004	15.00000 Quadratic
6 Dichlorprop	0.50000	0.51000	273452	0.001	-2.00048	15.00000 Quadratic
7 2,4-D	0.50000	0.50608	409186	0.001	-1.21666	15.00000 Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12737	1200144	0.001	-1.89229	15.00000 Quadratic
10 2,4,5-T	0.12500	0.12858	1206872	0.001	-2.86749	15.00000 Quadratic
11 2,4-DB	0.50000	0.51083	165744	0.001	-2.16561	15.00000 Quadratic
12 Dinoseb	0.12500	0.14079	1018376	0.001	-12.62938	15.00000 Quadratic

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuares  
 Curve Type : Average

## Calibration File Names:

Level 1: \\Nitro\chem\ECD-7.i\080225.b\008.D  
 Level 2: \\Nitro\chem\ECD-7.i\080225.b\009.D  
 Level 3: \\Nitro\chem\ECD-7.i\080225.b\010.D  
 Level 4: \\Nitro\chem\ECD-7.i\080225.b\011.D  
 Level 5: \\Nitro\chem\ECD-7.i\080225.b\012.D  
 Level 6: \\Nitro\chem\ECD-7.i\080225.b\013.D

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD
Level 1	Level 2	Level 3	Level 4	Level 5	Level 6			
24 Aroclor-1016(1)	158840	159210	146484	133258	127241	123063	141349	11.187
(2)	310860	291860	260992	235770	224535	216610	256771	14.848
(3)	408820	386270	334092	310422	300047	292621	338712	14.231
(4)	293400	278730	252684	230108	219207	211584	247619	13.396
(5)	229680	214740	190444	172898	163516	156677	187993	15.539
25 Aroclor-1221(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
26 Aroclor-1232(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
27 Aroclor-1242(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
28 Aroclor-1248(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
29 Aroclor-1254(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuares  
 Curve Type : Average

Compound	0.10000 Level 1	0.20000 Level 2	0.50000 Level 3	1.000 Level 4	1.500 Level 5	2.000 Level 6	RRF	% RSD	
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
30 Aroclor-1260(1)	435960	398870	352160	317264	304503	297008	350961	15.980	
(2)	662140	594040	528220	479210	464583	454213	530401	15.585	
(3)	338000	311930	278716	250210	239115	233383	275226	15.399	
(4)	393520	363710	328700	295740	284957	280092	324453	14.246	
(5)	800000	720480	655308	600802	587904	582351	657808	13.250	
41 Aroclor-1268(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
\$ 1 Tetrachloro-m-Xylene	8170200	7632900	7121200	6786120	6713173	6662370	7180994	8.425	
\$ 33 Decachlorobiphenyl (DCB)	7602000	6638300	6236720	5612620	5363707	5408550	6143649	14.210	

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i Injection Date: 26-FEB-2008 09:15  
Lab File ID: 034.D Init. Cal. Date(s): 25-FEB-2008 25-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 18:27 21:18  
Lab Sample ID: AR1660-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m

COMPOUND	RRF / AMOUNT	REF. 500	RRF	%D / %DRIFT	MAX	CURVE TYPE
1 Tetrachloro-m-Xylene	7180994	7034200	0.010	2.04420	15.00000	Averaged
24 Aroclor-1016(1)	141349	147488	0.010	-4.34286	15.00000	Averaged
(2)	256771	263304	0.010	-2.54425	15.00000	Averaged
(3)	338712	341120	0.010	-0.71094	15.00000	Averaged
(4)	247619	250792	0.010	-1.28149	15.00000	Averaged
(5)	187993	189168	0.010	-0.62529	15.00000	Averaged
30 Aroclor-1260(1)	350961	352584	0.010	-0.46251	15.00000	Averaged
(2)	530401	525912	0.010	0.84633	15.00000	Averaged
(3)	275226	279064	0.010	-1.39463	15.00000	Averaged
(4)	324453	329316	0.010	-1.49876	15.00000	Averaged
(5)	657808	654848	0.010	0.44990	15.00000	Averaged
33 Decachlorobiphenyl (DCB)	6143649	6148040	0.010	-0.07146	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i      Injection Date: 26-FEB-2008 20:03  
Lab File ID: 053.D      Init. Cal. Date(s): 25-FEB-2008    25-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    18:27      21:18  
Lab Sample ID: AR1660-CCV    Quant Type: ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m

COMPOUND	RRF / AMOUNT	RFO.500	MIN		MAX		CURVE TYPE
			RRF	%D / %DRIFT	%D / %DRIFT		
\$ 1 Tetrachloro-m-Xylene	7180994	7195880	0.010	-0.20730	15.00000	Averaged	
24 Aroclor-1016(1)	141349	149932	0.010	-6.07191	15.00000	Averaged	
(2)	256771	267300	0.010	-4.10050	15.00000	Averaged	
(3)	338712	341460	0.010	-0.81133	15.00000	Averaged	
(4)	247619	252168	0.010	-1.83719	15.00000	Averaged	
(5)	187993	192216	0.010	-2.24663	15.00000	Averaged	
30 Aroclor-1260(1)	350961	361564	0.010	-3.02120	15.00000	Averaged	
(2)	530401	539064	0.010	-1.63330	15.00000	Averaged	
(3)	275226	286664	0.010	-4.15600	15.00000	Averaged	
(4)	324453	336916	0.010	-3.84116	15.00000	Averaged	
(5)	657808	671424	0.010	-2.06998	15.00000	Averaged	
\$ 33 Decachlorobiphenyl (DCB)	6143649	6398480	0.010	-4.14787	15.00000	Averaged	

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuares  
 Curve Type : Average

## Calibration File Names:

Level 1: \\Nitro\chem\ECD-7.i\080225.b\080225.b\008.D  
 Level 2: \\Nitro\chem\ECD-7.i\080225.b\080225.b\009.D  
 Level 3: \\Nitro\chem\ECD-7.i\080225.b\080225.b\010.D  
 Level 4: \\Nitro\chem\ECD-7.i\080225.b\080225.b\011.D  
 Level 5: \\Nitro\chem\ECD-7.i\080225.b\080225.b\012.D  
 Level 6: \\Nitro\chem\ECD-7.i\080225.b\080225.b\013.D

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD
Level 1	Level 2	Level 3	Level 4	Level 5	Level 6			
24 Aroclor-1016(1)	188840	173810	160312	151714	148364	143570	161102	10.713
(2)	389440	365910	331688	304708	293963	285983	328615	12.686
(3)	495640	471650	418528	394776	391996	380247	425473	11.130
(4)	346180	342590	296512	269896	259909	257690	295463	13.655
(5)	279820	264950	236324	218764	210175	204070	235684	13.066
25 Aroclor-1221(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
26 Aroclor-1232(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
27 Aroclor-1242(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
28 Aroclor-1248(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
29 Aroclor-1254(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuares  
 Curve Type : Average

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
	Level 1	Level 2	Level 3	Level 4	Level 5	Level 6			
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
30 Aroclor-1260(1)	567080	523680	461776	423508	411521	399843	464568	14.504	
(2)	664040	607800	538796	501720	490820	478908	547014	13.510	
(3)	437600	407420	360736	334666	324281	318156	363810	13.383	
(4)	473600	429170	392640	363974	355959	348920	394044	12.410	
(5)	976180	895200	839180	787730	780368	775746	842401	9.493	
41 Aroclor-1268(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
\$ 1 Tetrachloro-m-Xylene	8765400	8524000	8383480	8206820	8182640	8157320	8369943	2.863	
\$ 33 Decachlorobiphenyl (DCB)	9036200	8137400	7697400	6931260	6726533	6806400	7555866	12.114	

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i Injection Date: 26-FEB-2008 09:15  
Lab File ID: 034.D Init. Cal. Date(s): 25-FEB-2008 25-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 18:27 21:18  
Lab Sample ID: AR1660-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m

COMPOUND	RRF / AMOUNT	MIN		MAX		CURVE TYPE
		RFO.500	RRF	%D / %DRIFT	%D / %DRIFT	
\$ 1 Tetrachloro-m-Xylene	8369943	7717080	0.010	7.80009	15.00000	Averaged
24 Aroclor-1016(1)	161102	152524	0.010	5.32438	15.00000	Averaged
(2)	328615	312224	0.010	4.98798	15.00000	Averaged
(3)	425473	405392	0.010	4.71965	15.00000	Averaged
(4)	295463	282664	0.010	4.33181	15.00000	Averaged
(5)	235684	229000	0.010	2.83591	15.00000	Averaged
30 Aroclor-1260(1)	464568	439964	0.010	5.29611	15.00000	Averaged
(2)	547014	516992	0.010	5.48834	15.00000	Averaged
(3)	363810	346632	0.010	4.72167	15.00000	Averaged
(4)	394044	373140	0.010	5.30494	15.00000	Averaged
(5)	842401	790092	0.010	6.20948	15.00000	Averaged
\$ 33 Decachlorobiphenyl (DCB)	7555866	7187520	0.010	4.87496	15.00000	Averaged



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i Injection Date: 26-FEB-2008 20:03  
Lab File ID: 053.D Init. Cal. Date(s): 25-FEB-2008 25-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 18:27 21:18  
Lab Sample ID: AR1660-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m

COMPOUND	RRF / AMOUNT	RFO.500	MIN		MAX		CURVE TYPE
			RRF	%D / %DRIFT	%D / %DRIFT		
\$ 1 Tetrachloro-m-Xylene	8369943	7609760	0.010	9.08230	15.00000	Averaged	
24 Aroclor-1016(1)	161102	152096	0.010	5.59005	15.00000	Averaged	
(2)	328615	309240	0.010	5.89604	15.00000	Averaged	
(3)	425473	395192	0.010	7.11698	15.00000	Averaged	
(4)	295463	278164	0.010	5.85484	15.00000	Averaged	
(5)	235684	226188	0.010	4.02903	15.00000	Averaged	
30 Aroclor-1260(1)	464568	437796	0.010	5.76278	15.00000	Averaged	
(2)	547014	511096	0.010	6.56619	15.00000	Averaged	
(3)	363810	345776	0.010	4.95695	15.00000	Averaged	
(4)	394044	372612	0.010	5.43893	15.00000	Averaged	
(5)	842401	788956	0.010	6.34433	15.00000	Averaged	
\$ 33 Decachlorobiphenyl (DCB)	7555866	7272560	0.010	3.74948	15.00000	Averaged	

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802326

Instrument ID: FID-2

Calibration Date(s): 02/18/08 02/19/08

Column:

ID: 2.00 (mm)

Calibration Time(s): 1455 0655

LAB FILE ID:

RF10: 016

RF50: 017

RF100: 018

RF250: 019

RF500: 020

COMPOUND	RF10	RF50	RF100	RF250	RF500
TPH-ORO (>C28-C35)	2410.000	1820.860	1920.020	1804.828	1577.508
TPH-DRO (>C10-C28)	2410.000	1820.860	1920.020	1804.828	1577.508
TPH-GRO (C6-C10)	2074.300	1871.040	1309.020	1221.916	1096.358
2-Fluorobiphenyl	1088.600	1268.100	1149.840	1445.700	1377.340

FORM VI TPH

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802326

Instrument ID: FID-2

Calibration Date(s): 02/18/08 02/19/08

Column:

ID: 2.00 (mm)

Calibration Time(s): 1455 0655

LAB FILE ID:

RF1000: 021

RF2000: 008

COMPOUND	RF1000	RF2000
TPH-ORO (>C28-C35)	1683.375	1825.634
TPH-DRO (>C10-C28)	1683.375	1825.634
TPH-GRO (C6-C10)	1088.556	1061.624
2-Fluorobiphenyl	1316.250	

FORM VI TPH

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802326

Instrument ID: FID-2

Calibration Date(s): 02/18/08 02/19/08

Column:

ID: 2.00 (mm)

Calibration Time(s): 1455

0655

COMPOUND	CURVE	COEFFICIENTS		%RSD OR R^2
		A0	A1	
TPH-ORO (>C28-C35)	AVRG		1863.17507	14.2
TPH-DRO (>C10-C28)	AVRG		1863.17507	14.2
TPH-GRO (C6-C10)	LINR	-28.205917	9.529e-004	1.000
2-Fluorobiphenyl	AVRG		1274.30500	10.6

FORM VI TPH

FORM 7  
TPH CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802326

Instrument ID: FID-2 Calibration Date: 02/21/08 Time: 2134

Lab File ID: 037 Init. Calib. Date(s): 02/18/08 02/19/08

Init. Calib. Times: 1455 0655

GC Column: ID: 2.00 (mm)

COMPOUND	SAMPLE AMOUNT	CAL100 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
C6-C12	236.170	250.000	LINR	5.5	25.0
>C12-C28	236.860	250.000	AVRG	5.2	25.0
<del>C28-C35</del>	<del>0.000</del>	<del>250.000</del>	<del>AVRG</del>	<del>100.0</del>	<del>25.0</del>
=====	=====	=====	=====	=====	=====
Trifluoromethyl benzene	48.387	50.000	AVRG	3.2	25.0
2-Fluorobiphenyl	52.671	50.000	AVRG	5.3	25.0

FORM VII TPH

FORM 7  
TPH CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802326

Instrument ID: FID-2 Calibration Date: 02/22/08 Time: 1327

Lab File ID: 056 Init. Calib. Date(s): 02/18/08 02/19/08

Init. Calib. Times: 1455 0655

GC Column: ID: 2.00 (mm)

COMPOUND	SAMPLE AMOUNT	CAL100 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
C6-C12	273.834	250.000	LINR	9.5	25.0
>C12-C28	294.192	250.000	AVRG	17.7	25.0
<del>C28-C35</del>	<del>0.000</del>	<del>250.000</del>	<del>AVRG</del>	<del>100.0</del>	<del>25.0</del>
=====	=====	=====	=====	=====	=====
Trifluoromethyl benzene	52.548	50.000	AVRG	5.1	25.0
2-Fluorobiphenyl	58.362	50.000	AVRG	16.7	25.0

FORM VII TPH

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802326

Instrument ID: FID-7

Calibration Date(s): 12/14/07 12/15/07

Column:

ID: 2.00 (mm)

Calibration Time(s): 1834

0254

LAB FILE ID:

RF10: A0000011

RF50: A0000012

RF100: A0000013

RF250: A0000014

RF500: A0000015

COMPOUND	RF10	RF50	RF100	RF250	RF500
=====	=====	=====	=====	=====	=====
C6-C12	13227.500	4003.180	3636.890	2666.084	2344.126
>C12-C28	2574.100	2034.400	2483.130	2451.196	2382.674
<del>C28-C35</del>	2574.100	2034.400	2483.130	2451.196	2382.674
=====	=====	=====	=====	=====	=====
Trifluoromethyl benzene	1795.200	1921.800	1997.480	1902.780	1806.820
2-Fluorobiphenyl	2676.000	2807.400	2920.960	2761.700	2637.790

FORM VI TPH

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802326

Instrument ID: FID-7

Calibration Date(s): 12/14/07 12/15/07

Column:

ID: 2.00 (mm)

Calibration Time(s): 1834

0254

LAB FILE ID:

RF1000: A0000016 RF2000: A0000017

COMPOUND	RF1000	RF2000
=====	=====	=====
C6-C12	1942.443	2192.853
>C12-C28	2093.992	2741.154
C28-C35	2093.992	2741.154
=====	=====	=====
Trifluoromethyl benzene	1765.635	
2-Fluorobiphenyl	2594.690	

FORM VI TPH



FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802326

Instrument ID: FID-7

Calibration Date(s): 12/14/07 12/15/07

Column:

ID: 2.00 (mm)

Calibration Time(s): 1834

0254

COMPOUND	CURVE	COEFFICIENTS		%RSD OR R^2
		A0	A1	
=====	=====	=====	=====	=====
C6-C12	LINR	-43.901170	4.758e-004	0.994
>C12-C28	AVRG		2394.37800	10.6
C28-C35	AVRG		2394.37800	10.6
=====	=====	=====	=====	=====
Trifluoromethyl benzene	AVRG		1864.95250	4.8
2-Fluorobiphenyl	AVRG		2733.09000	4.4
=====	=====	=====	=====	=====

FORM VI TPH

FORM 7  
TPH CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802326

Instrument ID: FID-7 Calibration Date: 02/22/08 Time: 1557

Lab File ID: A0000034 Init. Calib. Date(s): 12/14/07 12/15/07

Init. Calib. Times: 1834 0254

GC Column: \_\_\_\_\_ ID: 2.00 (mm)

COMPOUND	SAMPLE AMOUNT	CAL250 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
C6-C12	225.811	250.000	LINR	9.7	25.0
>C12-C28	223.302	250.000	AVRG	10.7	25.0
<del>C28-C35</del>	<del>0.630</del>	<del>250.000</del>	<del>AVRG</del>	<del>99.7</del>	<del>25.0</del>
=====	=====	=====	=====	=====	=====
Trifluoromethyl benzene	40.962	50.000	AVRG	18.1	25.0
2-Fluorobiphenyl	40.057	50.000	AVRG	19.9	25.0
=====	=====	=====	=====	=====	=====

*gr*

FORM VII TPH

FORM 7  
TPH CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802326

Instrument ID: FID-7 Calibration Date: 02/22/08 Time: 2007

Lab File ID: A0000040 Init. Calib. Date(s): 12/14/07 12/15/07

Init. Calib. Times: 1834 0254

GC Column: \_\_\_\_\_ ID: 2.00 (mm)

COMPOUND	SAMPLE AMOUNT	CAL250 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
C6-C12	270.229	250.000	LINR	8.1	25.0
>C12-C28	265.532	250.000	AVRG	6.2	25.0
<del>C28-C35</del>	<del>0.779</del>	<del>250.000</del>	<del>AVRG</del>	<del>99.7</del>	<del>25.0</del>
=====	=====	=====	=====	=====	=====
Trifluoromethyl benzene	47.480	50.000	AVRG	5.0	25.0
2-Fluorobiphenyl	47.507	50.000	AVRG	5.0	25.0

FORM VII TPH

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	98.77	98.77	97.15	97.15	P
Antimony	100.0	103.40	103.4	100.0	94.89	94.89	94.70	94.7	P
Arsenic	100.0	98.49	98.49	100.0	99.99	99.99	98.52	98.52	P
Barium	100.0	100.00	100	100.0	100.90	100.9	101.20	101.2	P
Beryllium	100.0	99.36	99.36	100.0	100.10	100.1	98.64	98.64	P
Boron	500.0	526.60	105.32	500.0	497.00	99.4	492.70	98.54	P
Cadmium	100.0	100.10	100.1	100.0	100.70	100.7	100.80	100.8	P
Calcium	10000.0	10260.00	102.6	10000.0	10310.00	103.1	9769.00	97.69	P
Chromium	100.0	97.92	97.92	100.0	99.65	99.65	100.20	100.2	P
Cobalt	100.0	100.40	100.4	100.0	99.79	99.79	99.71	99.71	P
Copper	100.0	102.40	102.4	100.0	101.70	101.7	99.15	99.15	P
Iron	10000.0	10010.00	100.1	10000.0	10200.00	102	10020.00	100.2	P
Lead	100.0	102.40	102.4	100.0	102.30	102.3	100.70	100.7	P
Magnesium	10000.0	9905.00	99.05	10000.0	10220.00	102.2	10020.00	100.2	P
Manganese	100.0	98.36	98.36	100.0	99.96	99.96	100.80	100.8	P
Molybdenum	100.0	101.00	101	100.0	102.40	102.4	100.40	100.4	P
Nickel	100.0	102.20	102.2	100.0	99.82	99.82	100.10	100.1	P
Potassium	10000.0	9853.00	98.53	10000.0	10090.00	100.9	10030.00	100.3	P
Selenium	100.0	99.30	99.3	100.0	103.10	103.1	100.90	100.9	P
Silver	100.0	104.50	104.5	100.0	103.00	103	102.20	102.2	P
Sodium	10000.0	9735.00	97.35	10000.0	9935.00	99.35	9901.00	99.01	P
Strontium	100.0	100.30	100.3	100.0	102.50	102.5	102.30	102.3	P
Thallium	100.0	98.79	98.79	100.0	100.70	100.7	99.80	99.8	P
Tin	100.0	106.30	106.3	100.0	103.50	103.5	103.10	103.1	P
Titanium	100.0	101.30	101.3	100.0	99.28	99.28	99.80	99.8	P
Vanadium	100.0	100.40	100.4	100.0	99.12	99.12	101.20	101.2	P
Zinc	100.0	99.05	99.05	100.0	99.02	99.02	98.22	98.22	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500\_080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	108.90	108.9	115.60	115.6	P
Antimony	100.0	103.40	103.4	100.0	92.31	92.31	100.30	100.3	P
Arsenic	100.0	98.49	98.49	100.0	96.93	96.93	99.22	99.22	P
Barium	100.0	100.00	100	100.0	99.24	99.24	99.78	99.78	P
Beryllium	100.0	99.36	99.36	100.0	97.16	97.16	97.99	97.99	P
Boron	500.0	526.60	105.32	500.0	481.00	96.2	485.00	97	P
Cadmium	100.0	100.10	100.1	100.0	99.18	99.18	98.75	98.75	P
Calcium	10000.0	10260.00	102.6	10000.0	9881.00	98.81	10790.00	107.9	P
Chromium	100.0	97.92	97.92	100.0	97.99	97.99	99.34	99.34	P
Cobalt	100.0	100.40	100.4	100.0	95.71	95.71	95.87	95.87	P
Copper	100.0	102.40	102.4	100.0	95.52	95.52	96.91	96.91	P
Iron	10000.0	10010.00	100.1	10000.0	9870.00	98.7	9931.00	99.31	P
Lead	100.0	102.40	102.4	100.0	100.20	100.2	98.80	98.8	P
Magnesium	10000.0	9905.00	99.05	10000.0	10110.00	101.1	10400.00	104	P
Manganese	100.0	98.36	98.36	100.0	99.93	99.93	101.80	101.8	P
Molybdenum	100.0	101.00	101	100.0	98.03	98.03	96.91	96.91	P
Nickel	100.0	102.20	102.2	100.0	94.49	94.49	97.15	97.15	P
Potassium	10000.0	9853.00	98.53	10000.0	10170.00	101.7	10480.00	104.8	P
Selenium	100.0	99.30	99.3	100.0	100.30	100.3	102.20	102.2	P
Silver	100.0	104.50	104.5	100.0	98.83	98.83	98.07	98.07	P
Sodium	10000.0	9735.00	97.35	10000.0	9844.00	98.44	10100.00	101	P
Strontium	100.0	100.30	100.3	100.0	103.10	103.1	103.00	103	P
Thallium	100.0	98.79	98.79	100.0	98.74	98.74	97.84	97.84	P
Tin	100.0	106.30	106.3	100.0	99.86	99.86	99.58	99.58	P
Titanium	100.0	101.30	101.3	100.0	98.57	98.57	98.96	98.96	P
Vanadium	100.0	100.40	100.4	100.0	98.91	98.91	100.30	100.3	P
Zinc	100.0	99.05	99.05	100.0	95.98	95.98	96.80	96.8	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	119.80	119.8	114.60	114.6	P
Antimony	100.0	103.40	103.4	100.0	93.51	93.51	92.53	92.53	P
Arsenic	100.0	98.49	98.49	100.0	96.69	96.69	95.40	95.4	P
Barium	100.0	100.00	100	100.0	98.98	98.98	98.87	98.87	P
Beryllium	100.0	99.36	99.36	100.0	96.89	96.89	94.49	94.49	P
Boron	500.0	526.60	105.32	500.0	484.50	96.9	477.80	95.56	P
Cadmium	100.0	100.10	100.1	100.0	99.06	99.06	97.25	97.25	P
Calcium	10000.0	10260.00	102.6	10000.0	10250.00	102.5	10470.00	104.7	P
Chromium	100.0	97.92	97.92	100.0	96.46	96.46	95.78	95.78	P
Cobalt	100.0	100.40	100.4	100.0	95.98	95.98	95.25	95.25	P
Copper	100.0	102.40	102.4	100.0	95.15	95.15	94.55	94.55	P
Iron	10000.0	10010.00	100.1	10000.0	9746.00	97.46	9652.00	96.52	P
Lead	100.0	102.40	102.4	100.0	100.90	100.9	101.00	101	P
Magnesium	10000.0	9905.00	99.05	10000.0	10100.00	101	10240.00	102.4	P
Manganese	100.0	98.36	98.36	100.0	99.36	99.36	98.22	98.22	P
Molybdenum	100.0	101.00	101	100.0	93.66	93.66	94.18	94.18	P
Nickel	100.0	102.20	102.2	100.0	95.09	95.09	95.95	95.95	P
Potassium	10000.0	9853.00	98.53	10000.0	10210.00	102.1	10350.00	103.5	P
Selenium	100.0	99.30	99.3	100.0	98.52	98.52	98.72	98.72	P
Silver	100.0	104.50	104.5	100.0	97.80	97.8	96.88	96.88	P
Sodium	10000.0	9735.00	97.35	10000.0	9705.00	97.05	9892.00	98.92	P
Strontium	100.0	100.30	100.3	100.0	101.90	101.9	102.10	102.1	P
Thallium	100.0	98.79	98.79	100.0	97.90	97.9	95.92	95.92	P
Tin	100.0	106.30	106.3	100.0	101.50	101.5	100.60	100.6	P
Titanium	100.0	101.30	101.3	100.0	101.80	101.8	100.20	100.2	P
Vanadium	100.0	100.40	100.4	100.0	100.40	100.4	99.56	99.56	P
Zinc	100.0	99.05	99.05	100.0	93.64	93.64	93.26	93.26	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	115.20	115.2	115.30	115.3	P
Antimony	100.0	103.40	103.4	100.0	93.09	93.09	96.39	96.39	P
Arsenic	100.0	98.49	98.49	100.0	96.89	96.89	96.78	96.78	P
Barium	100.0	100.00	100	100.0	97.78	97.78	99.01	99.01	P
Beryllium	100.0	99.36	99.36	100.0	96.39	96.39	96.22	96.22	P
Boron	500.0	526.60	105.32	500.0	487.70	97.54	504.90	100.98	P
Cadmium	100.0	100.10	100.1	100.0	97.43	97.43	97.84	97.84	P
Calcium	10000.0	10260.00	102.6	10000.0	10830.00	108.3	10770.00	107.7	P
Chromium	100.0	97.92	97.92	100.0	95.29	95.29	96.41	96.41	P
Cobalt	100.0	100.40	100.4	100.0	94.40	94.4	94.84	94.84	P
Copper	100.0	102.40	102.4	100.0	94.03	94.03	95.49	95.49	P
Iron	10000.0	10010.00	100.1	10000.0	9676.00	96.76	9780.00	97.8	P
Lead	100.0	102.40	102.4	100.0	101.30	101.3	101.30	101.3	P
Magnesium	10000.0	9905.00	99.05	10000.0	9892.00	98.92	10080.00	100.8	P
Manganese	100.0	98.36	98.36	100.0	98.63	98.63	99.14	99.14	P
Molybdenum	100.0	101.00	101	100.0	93.30	93.3	94.00	94	P
Nickel	100.0	102.20	102.2	100.0	94.42	94.42	95.61	95.61	P
Potassium	10000.0	9853.00	98.53	10000.0	10310.00	103.1	10560.00	105.6	P
Selenium	100.0	99.30	99.3	100.0	97.34	97.34	100.60	100.6	P
Silver	100.0	104.50	104.5	100.0	96.16	96.16	97.22	97.22	P
Sodium	10000.0	9735.00	97.35	10000.0	9564.00	95.64	9823.00	98.23	P
Strontium	100.0	100.30	100.3	100.0	103.60	103.6	103.80	103.8	P
Thallium	100.0	98.79	98.79	100.0	97.46	97.46	98.52	98.52	P
Tin	100.0	106.30	106.3	100.0	100.20	100.2	100.40	100.4	P
Titanium	100.0	101.30	101.3	100.0	100.30	100.3	101.10	101.1	P
Vanadium	100.0	100.40	100.4	100.0	99.69	99.69	100.00	100	P
Zinc	100.0	99.05	99.05	100.0	90.32	90.32	90.35	90.35	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	101.10	101.1	110.40	110.4	P
Antimony	100.0	103.40	103.4	100.0	96.99	96.99	96.20	96.2	P
Arsenic	100.0	98.49	98.49	100.0	96.94	96.94	101.00	101	P
Barium	100.0	100.00	100	100.0	101.10	101.1	102.30	102.3	P
Beryllium	100.0	99.36	99.36	100.0	100.50	100.5	101.60	101.6	P
Boron	500.0	526.60	105.32	500.0	506.40	101.28	505.10	101.02	P
Cadmium	100.0	100.10	100.1	100.0	100.80	100.8	101.60	101.6	P
Calcium	10000.0	10260.00	102.6	10000.0	10040.00	100.4	9754.00	97.54	P
Chromium	100.0	97.92	97.92	100.0	97.45	97.45	101.30	101.3	P
Cobalt	100.0	100.40	100.4	100.0	102.00	102	102.50	102.5	P
Copper	100.0	102.40	102.4	100.0	102.30	102.3	103.40	103.4	P
Iron	10000.0	10010.00	100.1	10000.0	9901.00	99.01	10060.00	100.6	P
Lead	100.0	102.40	102.4	100.0	102.10	102.1	101.70	101.7	P
Magnesium	10000.0	9905.00	99.05	10000.0	9954.00	99.54	10160.00	101.6	P
Manganese	100.0	98.36	98.36	100.0	98.52	98.52	102.00	102	P
Molybdenum	100.0	101.00	101	100.0	99.98	99.98	101.10	101.1	P
Nickel	100.0	102.20	102.2	100.0	100.80	100.8	102.70	102.7	P
Potassium	10000.0	9853.00	98.53	10000.0	9942.00	99.42	10160.00	101.6	P
Selenium	100.0	99.30	99.3	100.0	97.44	97.44	98.46	98.46	P
Silver	100.0	104.50	104.5	100.0	104.40	104.4	102.80	102.8	P
Sodium	10000.0	9735.00	97.35	10000.0	9835.00	98.35	10150.00	101.5	P
Strontium	100.0	100.30	100.3	100.0	100.10	100.1	101.10	101.1	P
Thallium	100.0	98.79	98.79	100.0	99.53	99.53	99.31	99.31	P
Tin	100.0	106.30	106.3	100.0	105.50	105.5	100.70	100.7	P
Titanium	100.0	101.30	101.3	100.0	102.60	102.6	105.80	105.8	P
Vanadium	100.0	100.40	100.4	100.0	99.79	99.79	100.80	100.8	P
Zinc	100.0	99.05	99.05	100.0	99.88	99.88	102.90	102.9	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN



2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	125.50	125.5	97.16	97.16	P
Antimony	100.0	103.40	103.4	100.0	92.46	92.46	92.47	92.47	P
Arsenic	100.0	98.49	98.49	100.0	98.64	98.64	97.47	97.47	P
Barium	100.0	100.00	100	100.0	100.60	100.6	93.64	93.64	P
Beryllium	100.0	99.36	99.36	100.0	101.50	101.5	92.89	92.89	P
Boron	500.0	526.60	105.32	500.0	506.40	101.28	455.40	91.08	P
Cadmium	100.0	100.10	100.1	100.0	100.60	100.6	92.68	92.68	P
Calcium	10000.0	10260.00	102.6	10000.0	9776.00	97.76	9529.00	95.29	P
Chromium	100.0	97.92	97.92	100.0	97.46	97.46	97.63	97.63	P
Cobalt	100.0	100.40	100.4	100.0	101.20	101.2	99.09	99.09	P
Copper	100.0	102.40	102.4	100.0	103.00	103	95.20	95.2	P
Iron	10000.0	10010.00	100.1	10000.0	9826.00	98.26	9432.00	94.32	P
Lead	100.0	102.40	102.4	100.0	101.90	101.9	92.64	92.64	P
Magnesium	10000.0	9905.00	99.05	10000.0	9909.00	99.09	9363.00	93.63	P
Manganese	100.0	98.36	98.36	100.0	99.36	99.36	97.87	97.87	P
Molybdenum	100.0	101.00	101	100.0	99.19	99.19	93.22	93.22	P
Nickel	100.0	102.20	102.2	100.0	102.30	102.3	94.16	94.16	P
Potassium	10000.0	9853.00	98.53	10000.0	10040.00	100.4	9461.00	94.61	P
Selenium	100.0	99.30	99.3	100.0	99.57	99.57	94.87	94.87	P
Silver	100.0	104.50	104.5	100.0	104.70	104.7	95.35	95.35	P
Sodium	10000.0	9735.00	97.35	10000.0	9847.00	98.47	9408.00	94.08	P
Strontium	100.0	100.30	100.3	100.0	101.10	101.1	94.10	94.1	P
Thallium	100.0	98.79	98.79	100.0	99.44	99.44	92.67	92.67	P
Tin	100.0	106.30	106.3	100.0	106.30	106.3	93.93	93.93	P
Titanium	100.0	101.30	101.3	100.0	102.00	102	93.67	93.67	P
Vanadium	100.0	100.40	100.4	100.0	101.00	101	98.74	98.74	P
Zinc	100.0	99.05	99.05	100.0	100.00	100	98.05	98.05	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	111.60	111.6	114.80	114.8	P
Antimony	100.0	103.40	103.4	100.0	95.84	95.84	98.30	98.3	P
Arsenic	100.0	98.49	98.49	100.0	100.70	100.7	103.40	103.4	P
Barium	100.0	100.00	100	100.0	100.20	100.2	102.30	102.3	P
Beryllium	100.0	99.36	99.36	100.0	99.99	99.99	101.90	101.9	P
Boron	500.0	526.60	105.32	500.0	497.30	99.46	509.00	101.8	P
Cadmium	100.0	100.10	100.1	100.0	101.80	101.8	100.70	100.7	P
Calcium	10000.0	10260.00	102.6	10000.0	10520.00	105.2	10050.00	100.5	P
Chromium	100.0	97.92	97.92	100.0	100.80	100.8	102.70	102.7	P
Cobalt	100.0	100.40	100.4	100.0	102.20	102.2	103.20	103.2	P
Copper	100.0	102.40	102.4	100.0	103.90	103.9	103.80	103.8	P
Iron	10000.0	10010.00	100.1	10000.0	10170.00	101.7	10300.00	103	P
Lead	100.0	102.40	102.4	100.0	101.00	101	100.20	100.2	P
Magnesium	10000.0	9905.00	99.05	10000.0	10430.00	104.3	10370.00	103.7	P
Manganese	100.0	98.36	98.36	100.0	101.60	101.6	103.50	103.5	P
Molybdenum	100.0	101.00	101	100.0	101.30	101.3	100.60	100.6	P
Nickel	100.0	102.20	102.2	100.0	103.70	103.7	103.50	103.5	P
Potassium	10000.0	9853.00	98.53	10000.0	10420.00	104.2	10510.00	105.1	P
Selenium	100.0	99.30	99.3	100.0	102.60	102.6	104.70	104.7	P
Silver	100.0	104.50	104.5	100.0	104.10	104.1	103.60	103.6	P
Sodium	10000.0	9735.00	97.35	10000.0	10430.00	104.3	10400.00	104	P
Strontium	100.0	100.30	100.3	100.0	102.40	102.4	102.70	102.7	P
Thallium	100.0	98.79	98.79	100.0	101.60	101.6	100.50	100.5	P
Tin	100.0	106.30	106.3	100.0	103.20	103.2	102.50	102.5	P
Titanium	100.0	101.30	101.3	100.0	101.80	101.8	105.80	105.8	P
Vanadium	100.0	100.40	100.4	100.0	102.70	102.7	103.10	103.1	P
Zinc	100.0	99.05	99.05	100.0	103.80	103.8	106.10	106.1	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	95.40	95.4	98.62	98.62	P
Antimony	100.0	94.79	94.79	100.0	96.23	96.23	96.28	96.28	P
Arsenic	100.0	96.28	96.28	100.0	97.18	97.18	97.59	97.59	P
Barium	100.0	99.64	99.64	100.0	97.00	97	101.80	101.8	P
Beryllium	100.0	98.99	98.99	100.0	97.33	97.33	98.41	98.41	P
Boron	500.0	519.80	103.96	500.0	480.80	96.16	485.00	97	P
Cadmium	100.0	100.20	100.2	100.0	98.72	98.72	101.70	101.7	P
Calcium	10000.0	9632.00	96.32	10000.0	9669.00	96.69	9923.00	99.23	P
Chromium	100.0	96.50	96.5	100.0	96.47	96.47	97.32	97.32	P
Cobalt	100.0	99.74	99.74	100.0	97.01	97.01	98.41	98.41	P
Copper	100.0	100.70	100.7	100.0	99.28	99.28	100.60	100.6	P
Iron	10000.0	9781.00	97.81	10000.0	9852.00	98.52	9987.00	99.87	P
Lead	100.0	102.90	102.9	100.0	98.66	98.66	101.30	101.3	P
Magnesium	10000.0	9861.00	98.61	10000.0	9840.00	98.4	9983.00	99.83	P
Manganese	100.0	97.42	97.42	100.0	98.20	98.2	100.10	100.1	P
Molybdenum	100.0	97.99	97.99	100.0	97.84	97.84	98.54	98.54	P
Nickel	100.0	99.96	99.96	100.0	98.04	98.04	100.10	100.1	P
Potassium	10000.0	9685.00	96.85	10000.0	9753.00	97.53	9865.00	98.65	P
Selenium	100.0	97.35	97.35	100.0	102.00	102	101.90	101.9	P
Silver	100.0	102.60	102.6	100.0	100.10	100.1	99.87	99.87	P
Sodium	10000.0	9801.00	98.01	10000.0	9689.00	96.89	9880.00	98.8	P
Strontium	100.0	98.14	98.14	100.0	97.74	97.74	99.39	99.39	P
Thallium	100.0	100.50	100.5	100.0	98.50	98.5	100.70	100.7	P
Tin	100.0	103.20	103.2	100.0	97.53	97.53	98.39	98.39	P
Titanium	100.0	99.87	99.87	100.0	98.08	98.08	100.20	100.2	P
Vanadium	100.0	99.33	99.33	100.0	98.85	98.85	98.45	98.45	P
Zinc	100.0	99.32	99.32	100.0	98.73	98.73	96.95	96.95	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500\_080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	100.90	100.9	94.88	94.88	P
Antimony	100.0	94.79	94.79	100.0	97.26	97.26	96.66	96.66	P
Arsenic	100.0	96.28	96.28	100.0	97.23	97.23	94.47	94.47	P
Barium	100.0	99.64	99.64	100.0	100.90	100.9	97.15	97.15	P
Beryllium	100.0	98.99	98.99	100.0	98.74	98.74	94.73	94.73	P
Boron	500.0	519.80	103.96	500.0	487.40	97.48	477.10	95.42	P
Cadmium	100.0	100.20	100.2	100.0	103.30	103.3	98.43	98.43	P
Calcium	10000.0	9632.00	96.32	10000.0	10030.00	100.3	9425.00	94.25	P
Chromium	100.0	96.50	96.5	100.0	98.86	98.86	94.66	94.66	P
Cobalt	100.0	99.74	99.74	100.0	98.99	98.99	94.98	94.98	P
Copper	100.0	100.70	100.7	100.0	100.80	100.8	96.11	96.11	P
Iron	10000.0	9781.00	97.81	10000.0	10150.00	101.5	9662.00	96.62	P
Lead	100.0	102.90	102.9	100.0	103.30	103.3	97.17	97.17	P
Magnesium	10000.0	9861.00	98.61	10000.0	10440.00	104.4	9603.00	96.03	P
Manganese	100.0	97.42	97.42	100.0	100.80	100.8	98.71	98.71	P
Molybdenum	100.0	97.99	97.99	100.0	100.30	100.3	94.98	94.98	P
Nickel	100.0	99.96	99.96	100.0	99.38	99.38	93.86	93.86	P
Potassium	10000.0	9685.00	96.85	10000.0	9987.00	99.87	9426.00	94.26	P
Selenium	100.0	97.35	97.35	100.0	104.10	104.1	97.74	97.74	P
Silver	100.0	102.60	102.6	100.0	103.00	103	97.41	97.41	P
Sodium	10000.0	9801.00	98.01	10000.0	10340.00	103.4	9591.00	95.91	P
Strontium	100.0	98.14	98.14	100.0	101.30	101.3	96.59	96.59	P
Thallium	100.0	100.50	100.5	100.0	101.60	101.6	95.66	95.66	P
Tin	100.0	103.20	103.2	100.0	101.50	101.5	96.41	96.41	P
Titanium	100.0	99.87	99.87	100.0	100.10	100.1	95.37	95.37	P
Vanadium	100.0	99.33	99.33	100.0	100.20	100.2	95.65	95.65	P
Zinc	100.0	99.32	99.32	100.0	99.52	99.52	95.74	95.74	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	108.30	108.3	110.30	110.3	P
Antimony	100.0	94.79	94.79	100.0	91.08	91.08	93.01	93.01	P
Arsenic	100.0	96.28	96.28	100.0	94.16	94.16	94.05	94.05	P
Barium	100.0	99.64	99.64	100.0	97.32	97.32	98.48	98.48	P
Beryllium	100.0	98.99	98.99	100.0	93.00	93	93.34	93.34	P
Boron	500.0	519.80	103.96	500.0	480.70	96.14	471.40	94.28	P
Cadmium	100.0	100.20	100.2	100.0	98.89	98.89	99.47	99.47	P
Calcium	10000.0	9632.00	96.32	10000.0	9283.00	92.83	9400.00	94	P
Chromium	100.0	96.50	96.5	100.0	94.06	94.06	92.81	92.81	P
Cobalt	100.0	99.74	99.74	100.0	96.07	96.07	95.04	95.04	P
Copper	100.0	100.70	100.7	100.0	96.38	96.38	97.21	97.21	P
Iron	10000.0	9781.00	97.81	10000.0	9470.00	94.7	9499.00	94.99	P
Lead	100.0	102.90	102.9	100.0	100.50	100.5	101.80	101.8	P
Magnesium	10000.0	9861.00	98.61	10000.0	9438.00	94.38	9284.00	92.84	P
Manganese	100.0	97.42	97.42	100.0	97.35	97.35	95.92	95.92	P
Molybdenum	100.0	97.99	97.99	100.0	93.96	93.96	94.21	94.21	P
Nickel	100.0	99.96	99.96	100.0	95.50	95.5	95.26	95.26	P
Potassium	10000.0	9685.00	96.85	10000.0	9379.00	93.79	9370.00	93.7	P
Selenium	100.0	97.35	97.35	100.0	96.41	96.41	98.22	98.22	P
Silver	100.0	102.60	102.6	100.0	100.30	100.3	100.50	100.5	P
Sodium	10000.0	9801.00	98.01	10000.0	9297.00	92.97	9144.00	91.44	P
Strontium	100.0	98.14	98.14	100.0	98.44	98.44	98.39	98.39	P
Thallium	100.0	100.50	100.5	100.0	98.09	98.09	98.37	98.37	P
Tin	100.0	103.20	103.2	100.0	101.40	101.4	101.80	101.8	P
Titanium	100.0	99.87	99.87	100.0	97.27	97.27	96.32	96.32	P
Vanadium	100.0	99.33	99.33	100.0	98.52	98.52	97.27	97.27	P
Zinc	100.0	99.32	99.32	100.0	94.15	94.15	92.79	92.79	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	109.60	109.6	95.34	95.34	P
Antimony	100.0	94.79	94.79	100.0	97.36	97.36	89.67	89.67	P
Arsenic	100.0	96.28	96.28	100.0	95.64	95.64	91.47	91.47	P
Barium	100.0	99.64	99.64	100.0	98.78	98.78	88.15	88.15	P
Beryllium	100.0	98.99	98.99	100.0	93.66	93.66	83.42	83.42	P
Boron	500.0	519.80	103.96	500.0	467.30	93.46	430.00	86	P
Cadmium	100.0	100.20	100.2	100.0	98.25	98.25	88.37	88.37	P
Calcium	10000.0	9632.00	96.32	10000.0	9537.00	95.37	8512.00	85.12	P
Chromium	100.0	96.50	96.5	100.0	93.84	93.84	88.88	88.88	P
Cobalt	100.0	99.74	99.74	100.0	94.03	94.03	91.22	91.22	P
Copper	100.0	100.70	100.7	100.0	95.92	95.92	83.03	83.03	P
Iron	10000.0	9781.00	97.81	10000.0	9634.00	96.34	8412.00	84.12	P
Lead	100.0	102.90	102.9	100.0	100.00	100	89.37	89.37	P
Magnesium	10000.0	9861.00	98.61	10000.0	9405.00	94.05	8103.00	81.03	P
Manganese	100.0	97.42	97.42	100.0	97.06	97.06	94.10	94.1	P
Molybdenum	100.0	97.99	97.99	100.0	96.03	96.03	84.64	84.64	P
Nickel	100.0	99.96	99.96	100.0	93.96	93.96	80.83	80.83	P
Potassium	10000.0	9685.00	96.85	10000.0	9586.00	95.86	8363.00	83.63	P
Selenium	100.0	97.35	97.35	100.0	99.57	99.57	88.80	88.8	P
Silver	100.0	102.60	102.6	100.0	97.25	97.25	89.51	89.51	P
Sodium	10000.0	9801.00	98.01	10000.0	9374.00	93.74	7938.00	79.38	P
Strontium	100.0	98.14	98.14	100.0	98.04	98.04	90.43	90.43	P
Thallium	100.0	100.50	100.5	100.0	97.16	97.16	86.40	86.4	P
Tin	100.0	103.20	103.2	100.0	96.58	96.58	93.76	93.76	P
Titanium	100.0	99.87	99.87	100.0	95.10	95.1	83.60	83.6	P
Vanadium	100.0	99.33	99.33	100.0	95.86	95.86	93.57	93.57	P
Zinc	100.0	99.32	99.32	100.0	94.42	94.42	89.65	89.65	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	105.40	105.4	103.10	103.1	P
Antimony	100.0	94.79	94.79	100.0	93.53	93.53	93.09	93.09	P
Arsenic	100.0	96.28	96.28	100.0	94.29	94.29	96.14	96.14	P
Barium	100.0	99.64	99.64	100.0	100.20	100.2	99.31	99.31	P
Beryllium	100.0	98.99	98.99	100.0	93.65	93.65	98.77	98.77	P
Boron	500.0	519.80	103.96	500.0	488.00	97.6	500.40	100.08	P
Cadmium	100.0	100.20	100.2	100.0	99.64	99.64	99.64	99.64	P
Calcium	10000.0	9632.00	96.32	10000.0	9373.00	93.73	9678.00	96.78	P
Chromium	100.0	96.50	96.5	100.0	92.79	92.79	94.74	94.74	P
Cobalt	100.0	99.74	99.74	100.0	93.37	93.37	99.08	99.08	P
Copper	100.0	100.70	100.7	100.0	91.90	91.9	99.84	99.84	P
Iron	10000.0	9781.00	97.81	10000.0	9428.00	94.28	9655.00	96.55	P
Lead	100.0	102.90	102.9	100.0	101.50	101.5	100.80	100.8	P
Magnesium	10000.0	9861.00	98.61	10000.0	8932.00	89.32	9805.00	98.05	P
Manganese	100.0	97.42	97.42	100.0	96.49	96.49	96.11	96.11	P
Molybdenum	100.0	97.99	97.99	100.0	94.14	94.14	96.34	96.34	P
Nickel	100.0	99.96	99.96	100.0	90.59	90.59	98.91	98.91	P
Potassium	10000.0	9685.00	96.85	10000.0	9235.00	92.35	9739.00	97.39	P
Selenium	100.0	97.35	97.35	100.0	97.98	97.98	96.27	96.27	P
Silver	100.0	102.60	102.6	100.0	97.76	97.76	102.50	102.5	P
Sodium	10000.0	9801.00	98.01	10000.0	8806.00	88.06	9592.00	95.92	P
Strontium	100.0	98.14	98.14	100.0	100.10	100.1	99.37	99.37	P
Thallium	100.0	100.50	100.5	100.0	98.17	98.17	97.55	97.55	P
Tin	100.0	103.20	103.2	100.0	102.60	102.6	104.70	104.7	P
Titanium	100.0	99.87	99.87	100.0	94.42	94.42	99.41	99.41	P
Vanadium	100.0	99.33	99.33	100.0	96.83	96.83	97.30	97.3	P
Zinc	100.0	99.32	99.32	100.0	93.26	93.26	98.07	98.07	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	113.00	113	91.96	91.96	P
Antimony	100.0	94.79	94.79	100.0	95.53	95.53	95.87	95.87	P
Arsenic	100.0	96.28	96.28	100.0	95.33	95.33	97.49	97.49	P
Barium	100.0	99.64	99.64	100.0	100.00	100	91.82	91.82	P
Beryllium	100.0	98.99	98.99	100.0	99.64	99.64	89.97	89.97	P
Boron	500.0	519.80	103.96	500.0	496.90	99.38	439.60	87.92	P
Cadmium	100.0	100.20	100.2	100.0	99.87	99.87	91.06	91.06	P
Calcium	10000.0	9632.00	96.32	10000.0	10300.00	103	9431.00	94.31	P
Chromium	100.0	96.50	96.5	100.0	95.08	95.08	96.61	96.61	P
Cobalt	100.0	99.74	99.74	100.0	95.72	95.72	97.21	97.21	P
Copper	100.0	100.70	100.7	100.0	99.49	99.49	92.36	92.36	P
Iron	10000.0	9781.00	97.81	10000.0	9891.00	98.91	9166.00	91.66	P
Lead	100.0	102.90	102.9	100.0	98.99	98.99	91.42	91.42	P
Magnesium	10000.0	9861.00	98.61	10000.0	10110.00	101.1	9475.00	94.75	P
Manganese	100.0	97.42	97.42	100.0	99.07	99.07	98.20	98.2	P
Molybdenum	100.0	97.99	97.99	100.0	95.96	95.96	90.69	90.69	P
Nickel	100.0	99.96	99.96	100.0	101.10	101.1	93.10	93.1	P
Potassium	10000.0	9685.00	96.85	10000.0	10340.00	103.4	9591.00	95.91	P
Selenium	100.0	97.35	97.35	100.0	99.09	99.09	91.79	91.79	P
Silver	100.0	102.60	102.6	100.0	97.66	97.66	90.74	90.74	P
Sodium	10000.0	9801.00	98.01	10000.0	10040.00	100.4	9360.00	93.6	P
Strontium	100.0	98.14	98.14	100.0	100.40	100.4	93.58	93.58	P
Thallium	100.0	100.50	100.5	100.0	96.12	96.12	89.64	89.64	P
Tin	100.0	103.20	103.2	100.0	97.02	97.02	89.86	89.86	P
Titanium	100.0	99.87	99.87	100.0	101.90	101.9	94.23	94.23	P
Vanadium	100.0	99.33	99.33	100.0	96.25	96.25	98.41	98.41	P
Zinc	100.0	99.32	99.32	100.0	96.56	96.56	97.79	97.79	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN



2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	105.70	105.7	100.30	100.3	P
Antimony	100.0	94.79	94.79	100.0	96.81	96.81	97.48	97.48	P
Arsenic	100.0	96.28	96.28	100.0	98.06	98.06	95.69	95.69	P
Barium	100.0	99.64	99.64	100.0	102.50	102.5	98.32	98.32	P
Beryllium	100.0	98.99	98.99	100.0	101.90	101.9	101.50	101.5	P
Boron	500.0	519.80	103.96	500.0	507.70	101.54	500.30	100.06	P
Cadmium	100.0	100.20	100.2	100.0	103.00	103	99.26	99.26	P
Calcium	10000.0	9632.00	96.32	10000.0	10700.00	107	9802.00	98.02	P
Chromium	100.0	96.50	96.5	100.0	98.02	98.02	96.44	96.44	P
Cobalt	100.0	99.74	99.74	100.0	98.10	98.1	96.61	96.61	P
Copper	100.0	100.70	100.7	100.0	103.60	103.6	101.10	101.1	P
Iron	10000.0	9781.00	97.81	10000.0	10400.00	104	9991.00	99.91	P
Lead	100.0	102.90	102.9	100.0	101.70	101.7	98.49	98.49	P
Magnesium	10000.0	9861.00	98.61	10000.0	10680.00	106.8	9906.00	99.06	P
Manganese	100.0	97.42	97.42	100.0	99.91	99.91	96.90	96.9	P
Molybdenum	100.0	97.99	97.99	100.0	100.90	100.9	97.40	97.4	P
Nickel	100.0	99.96	99.96	100.0	103.90	103.9	100.30	100.3	P
Potassium	10000.0	9685.00	96.85	10000.0	10770.00	107.7	9926.00	99.26	P
Selenium	100.0	97.35	97.35	100.0	104.80	104.8	100.20	100.2	P
Silver	100.0	102.60	102.6	100.0	100.70	100.7	100.50	100.5	P
Sodium	10000.0	9801.00	98.01	10000.0	10600.00	106	9855.00	98.55	P
Strontium	100.0	98.14	98.14	100.0	103.30	103.3	99.29	99.29	P
Thallium	100.0	100.50	100.5	100.0	100.70	100.7	97.89	97.89	P
Tin	100.0	103.20	103.2	100.0	99.39	99.39	99.00	99	P
Titanium	100.0	99.87	99.87	100.0	106.30	106.3	99.91	99.91	P
Vanadium	100.0	99.33	99.33	100.0	98.69	98.69	97.60	97.6	P
Zinc	100.0	99.32	99.32	100.0	96.99	96.99	98.65	98.65	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	100.60	100.6			P
Antimony	100.0	94.79	94.79	100.0	96.93	96.93			P
Arsenic	100.0	96.28	96.28	100.0	95.27	95.27			P
Barium	100.0	99.64	99.64	100.0	98.93	98.93			P
Beryllium	100.0	98.99	98.99	100.0	100.30	100.3			P
Boron	500.0	519.80	103.96	500.0	492.00	98.4			P
Cadmium	100.0	100.20	100.2	100.0	98.73	98.73			P
Calcium	10000.0	9632.00	96.32	10000.0	9620.00	96.2			P
Chromium	100.0	96.50	96.5	100.0	95.23	95.23			P
Cobalt	100.0	99.74	99.74	100.0	96.69	96.69			P
Copper	100.0	100.70	100.7	100.0	100.00	100			P
Iron	10000.0	9781.00	97.81	10000.0	9923.00	99.23			P
Lead	100.0	102.90	102.9	100.0	98.66	98.66			P
Magnesium	10000.0	9861.00	98.61	10000.0	9714.00	97.14			P
Manganese	100.0	97.42	97.42	100.0	96.06	96.06			P
Molybdenum	100.0	97.99	97.99	100.0	97.20	97.2			P
Nickel	100.0	99.96	99.96	100.0	99.58	99.58			P
Potassium	10000.0	9685.00	96.85	10000.0	9826.00	98.26			P
Selenium	100.0	97.35	97.35	100.0	99.75	99.75			P
Silver	100.0	102.60	102.6	100.0	101.00	101			P
Sodium	10000.0	9801.00	98.01	10000.0	9758.00	97.58			P
Strontium	100.0	98.14	98.14	100.0	99.62	99.62			P
Thallium	100.0	100.50	100.5	100.0	97.97	97.97			P
Tin	100.0	103.20	103.2	100.0	99.26	99.26			P
Titanium	100.0	99.87	99.87	100.0	100.10	100.1			P
Vanadium	100.0	99.33	99.33	100.0	96.54	96.54			P
Zinc	100.0	99.32	99.32	100.0	98.19	98.19			P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500 080227A

Continuing Calibration Source:

Start: 2/27/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Lithium	100.0	97.33	97.33	100.0	95.50	95.5	95.64	95.64	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500 080227A

Continuing Calibration Source:

Start: 2/27/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Lithium	100.0	97.33	97.33	100.0	94.25	94.25	96.51	96.51	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: ICP7500 080227A

Continuing Calibration Source:

Start: 2/27/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Lithium	100.0	97.33	97.33	100.0	96.80	96.8			P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L) C		Continuing Calibration Blank (ug/L)						Prepa- ration Blank C		M
			1	C	2	C	3	C			
Aluminum	-3.2		-0.8		2.0	J	31.0		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
	C		1	C	2	C	3	C	C		
Aluminum	-3.2		30.2		9.6	J	4.0	J	0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
	C		1	C	2	C	3	C	C		
Aluminum	-3.2		10.6		16.6		25.5		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN



3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	-3.2		18.8		7.2	J	33.2		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L) C		Continuing Calibration Blank (ug/L)						Prepa- ration Blank C		M
	1	C	2	C	3	C					
Aluminum	-3.2		17.3						0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	5.9		0.1		0.1		0.1		0.000		P
Arsenic	0.4		0.1		0.3		0.3		0.000		P
Barium	2.2	J	1.6	J	1.6	J	1.8	J	0.176		P
Beryllium	0.3		0.0		0.0		0.0		0.000		P
Boron	19.5	J	1.7		0.2		0.6		0.000		P
Cadmium	0.2	J	0.0		0.0		0.0		0.000		P
Calcium	-31.9		-21.0		-2.3		207.0	J	0.000		P
Chromium	0.3		0.0		0.0		0.1		0.000		P
Cobalt	0.1	J	0.0		0.0		0.0		0.000		P
Copper	0.6	J	0.4	J	0.2		0.6	J	0.230		P
Iron	27.2	J	40.7	J	17.6		57.2	J	0.000		P
Lead	0.2	J	0.1		0.0		0.4	J	0.000		P
Magnesium	24.9		0.9		1.9		10.7		0.000		P
Manganese	0.1		0.2		0.1		0.8		0.000		P
Molybdenum	1.0		0.1		0.1		0.1		0.000		P
Nickel	0.7	J	0.5	J	0.5	J	0.6	J	0.000		P
Potassium	0.5		-18.0		-21.0		-9.3		0.000		P
Selenium	1.7		2.3	J	2.1	J	2.0	J	0.253		P
Silver	1.2	J	1.0	J	1.0	J	1.0	J	0.102		P
Sodium	-127.2		-260.0		-270.0		-320.0		0.000		P
Strontium	0.2		0.3		0.4		0.6	J	0.000		P
Thallium	0.2		0.2		0.0		0.0		0.000		P
Tin	0.4		0.0		0.0		0.0		1.129		P
Titanium	0.2		0.0		0.1		0.3		0.000		P
Vanadium	1.0	J	0.8	J	1.1	J	1.2	J	0.149		P
Zinc	-2.8		-3.2		-3.7		-1.6		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	5.9		0.1		0.1		0.2		0.000		P
Arsenic	0.4		0.2		0.3		0.3		0.000		P
Barium	2.2	J	1.9	J	2.4	J	2.1	J	0.176		P
Beryllium	0.3		0.0		0.0		0.0		0.000		P
Boron	19.5	J	0.8		0.5		2.0		0.000		P
Cadmium	0.2	J	0.0		0.0		0.0		0.000		P
Calcium	-31.9		98.0	J	-71.0		-96.0		0.000		P
Chromium	0.3		0.1		0.1		0.1		0.000		P
Cobalt	0.1	J	0.0		0.0		0.0		0.000		P
Copper	0.6	J	0.5	J	0.0		0.1		0.230		P
Iron	27.2	J	62.1	J	39.9	J	33.1	J	0.000		P
Lead	0.2	J	0.1		0.0		0.0		0.000		P
Magnesium	24.9		12.9		6.2		5.5		0.000		P
Manganese	0.1		0.6		0.1		0.1		0.000		P
Molybdenum	1.0		0.0		0.0		0.1		0.000		P
Nickel	0.7	J	0.6	J	0.4	J	0.4	J	0.000		P
Potassium	0.5		1.7		-4.0		0.0		0.000		P
Selenium	1.7		2.4	J	2.1	J	2.6	J	0.253		P
Silver	1.2	J	1.0	J	1.0	J	1.1	J	0.102		P
Sodium	-127.2		-320.0		-330.0		-330.0		0.000		P
Strontium	0.2		0.4	J	0.2		0.1		0.000		P
Thallium	0.2		0.0		0.0		0.3		0.000		P
Tin	0.4		0.0		0.0		0.1		1.129		P
Titanium	0.2		2.0	J	0.3		0.1		0.000		P
Vanadium	1.0	J	1.1	J	1.2	J	1.0	J	0.149		P
Zinc	-2.8		-1.9		-3.9		-3.9		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	5.9		0.2		3.2	J	-0.8		0.000		P
Arsenic	0.4		0.3		0.5		0.0		0.000		P
Barium	2.2	J	1.7	J	2.2	J	1.4	J	0.176		P
Beryllium	0.3		0.0		0.8	J	0.0		0.000		P
Boron	19.5	J	0.4		22.9		-3.7		0.000		P
Cadmium	0.2	J	0.0		0.8	J	0.0		0.000		P
Calcium	-31.9		424.0	J	248.0	J	6.0		0.000		P
Chromium	0.3		0.0		-1.3		-1.9		0.000		P
Cobalt	0.1	J	0.0		0.6	J	0.0		0.000		P
Copper	0.6	J	0.2		1.5	J	0.7	J	0.230		P
Iron	27.2	J	57.6	J	104.0	J	11.5		0.000		P
Lead	0.2	J	0.0		1.0	J	0.1		0.000		P
Magnesium	24.9		11.6		96.4	J	6.7		0.000		P
Manganese	0.1		0.3		1.0		0.3		0.000		P
Molybdenum	1.0		0.0		2.0	J	-0.2		0.000		P
Nickel	0.7	J	0.5	J	0.9	J	0.2		0.000		P
Potassium	0.5		17.2		82.4	J	-7.0		0.000		P
Selenium	1.7		2.8	J	1.6		0.7		0.253		P
Silver	1.2	J	1.0	J	1.2	J	0.4	J	0.102		P
Sodium	-127.2		-320.0		90.2	J	-4.0		0.000		P
Strontium	0.2		1.0	J	1.1	J	0.0		0.000		P
Thallium	0.2		0.0		1.3	J	0.1		0.000		P
Tin	0.4		0.0		1.1	J	-0.1		1.129		P
Titanium	0.2		0.3		1.0	J	0.3		0.000		P
Vanadium	1.0	J	1.2	J	1.1	J	0.5	J	0.149		P
Zinc	-2.8		-4.0		0.8		0.1		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	5.9		-0.7		-0.8		-0.8		0.000		P
Arsenic	0.4		0.0		0.0		0.0		0.000		P
Barium	2.2	J	1.4	J	1.3	J	1.6	J	0.176		P
Beryllium	0.3		0.0		0.0		0.0		0.000		P
Boron	19.5	J	-3.8		-2.9		-3.0		0.000		P
Cadmium	0.2	J	0.0		0.0		0.0		0.000		P
Calcium	-31.9		22.3		-42.0		-5.9		0.000		P
Chromium	0.3		-1.9		-1.9		-1.9		0.000		P
Cobalt	0.1	J	0.0		0.0		0.0		0.000		P
Copper	0.6	J	0.6	J	0.6	J	0.6	J	0.230		P
Iron	27.2	J	5.0		-7.7		27.9	J	0.000		P
Lead	0.2	J	0.0		0.1		0.1		0.000		P
Magnesium	24.9		7.4		0.3		11.3		0.000		P
Manganese	0.1		0.0		0.0		0.6		0.000		P
Molybdenum	1.0		-0.2		-0.1		-0.1		0.000		P
Nickel	0.7	J	0.1		0.2		0.2		0.000		P
Potassium	0.5		-2.0		-9.4		-3.6		0.000		P
Selenium	1.7		1.0		1.1		1.4		0.253		P
Silver	1.2	J	0.4	J	0.4	J	0.4	J	0.102		P
Sodium	-127.2		-6.9		-12.0		-3.0		0.000		P
Strontium	0.2		0.1		0.0		0.1		0.000		P
Thallium	0.2		0.0		0.0		0.0		0.000		P
Tin	0.4		0.1		-0.1		-0.1		1.129		P
Titanium	0.2		0.3		0.0		0.2		0.000		P
Vanadium	1.0	J	0.6	J	0.5	J	0.6	J	0.149		P
Zinc	-2.8		-1.0		-0.1		-0.1		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	5.9		-0.8						0.000		P
Arsenic	0.4		-0.1						0.000		P
Barium	2.2	J	1.4	J					0.176		P
Beryllium	0.3		0.0						0.000		P
Boron	19.5	J	-3.8						0.000		P
Cadmium	0.2	J	0.0						0.000		P
Calcium	-31.9		-30.0						0.000		P
Chromium	0.3		-1.9						0.000		P
Cobalt	0.1	J	0.0						0.000		P
Copper	0.6	J	0.6	J					0.230		P
Iron	27.2	J	6.3						0.000		P
Lead	0.2	J	0.0						0.000		P
Magnesium	24.9		3.3						0.000		P
Manganese	0.1		0.2						0.000		P
Molybdenum	1.0		-0.2						0.000		P
Nickel	0.7	J	0.1						0.000		P
Potassium	0.5		-8.0						0.000		P
Selenium	1.7		1.2						0.253		P
Silver	1.2	J	0.4	J					0.102		P
Sodium	-127.2		-10.0						0.000		P
Strontium	0.2		0.0						0.000		P
Thallium	0.2		-0.1						0.000		P
Tin	0.4		-0.1						1.129		P
Titanium	0.2		0.1						0.000		P
Vanadium	1.0	J	0.6	J					0.149		P
Zinc	-2.8		0.1						0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	-0.1		-0.4		-0.4		-0.1		0.000		P
Arsenic	0.0		0.0		0.0		0.0		0.000		P
Barium	1.4	J	1.3	J	1.3	J	1.2	J	0.000		P
Beryllium	0.2		0.0		0.0		0.0		0.000		P
Boron	-4.0		-6.2		-8.5		-8.8		0.000		P
Cadmium	0.2	J	0.0		0.0		0.0		0.000		P
Calcium	119.1	J	4.0		-11.0		6.4		0.000		P
Chromium	-1.8		-1.9		-1.8		-1.8		0.000		P
Cobalt	0.2	J	0.0		0.0		0.0		0.000		P
Copper	1.3	J	0.7	J	0.8	J	0.8	J	0.000		P
Iron	9.1		2.4		6.0		6.4		0.000		P
Lead	0.1		0.0		0.0		0.0		0.000		P
Magnesium	21.4		1.2		0.3		2.6		0.000		P
Manganese	0.1		0.0		0.0		0.0		0.000		P
Molybdenum	0.0		-0.2		-0.3		-0.1		0.000		P
Nickel	0.6	J	0.4	J	0.4	J	0.4	J	0.000		P
Potassium	16.2		-2.5		-5.7		-2.2		0.000		P
Selenium	2.1	J	2.2	J	2.1	J	2.6	J	0.000		P
Silver	0.9	J	0.8	J	0.8	J	0.8	J	0.000		P
Sodium	13.9		-13.0		-26.0		-39.0		0.000		P
Strontium	0.4		0.1		0.1		0.1		0.000		P
Thallium	0.0		-0.1		-0.2		-0.2		0.000		P
Tin	0.1		-0.1		-0.1		-0.1		0.000		P
Titanium	-0.8		-0.9		-0.9		-0.9		0.000		P
Vanadium	0.6	J	0.6	J	0.5	J	0.7	J	0.000		P
Zinc	2.6	J	0.9		1.1		1.1		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN



3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Antimony	-0.1		-0.4		-0.2		-0.2		0.000		P
Arsenic	0.0		0.1		0.3		0.5		0.000		P
Barium	1.4	J	1.4	J	1.8	J	1.8	J	0.000		P
Beryllium	0.2		0.0		0.2		0.2		0.000		P
Boron	-4.0		-9.0		-8.0		-8.6		0.000		P
Cadmium	0.2	J	0.0		0.2	J	0.1		0.000		P
Calcium	119.1	J	-26.0		82.1	J	75.0		0.000		P
Chromium	-1.8		-1.9		-1.7		-1.7		0.000		P
Cobalt	0.2	J	0.0		0.1	J	0.1	J	0.000		P
Copper	1.3	J	0.6	J	1.2	J	1.1	J	0.000		P
Iron	9.1		-4.9		41.7	J	26.4	J	0.000		P
Lead	0.1		0.0		0.2	J	0.2		0.000		P
Magnesium	21.4		-0.4		27.8	J	23.8		0.000		P
Manganese	0.1		0.6		0.3		0.2		0.000		P
Molybdenum	0.0		-0.3		-0.1		0.0		0.000		P
Nickel	0.6	J	0.4	J	0.6	J	0.6	J	0.000		P
Potassium	16.2		-11.0		10.4		2.1		0.000		P
Selenium	2.1	J	2.4	J	2.2	J	2.2	J	0.000		P
Silver	0.9	J	0.8	J	0.9	J	0.9	J	0.000		P
Sodium	13.9		-57.0		-42.0		-52.0		0.000		P
Strontium	0.4		0.0		0.4	J	0.4		0.000		P
Thallium	0.0		-0.2		0.0		0.2		0.000		P
Tin	0.1		-0.1		0.1		0.1		0.000		P
Titanium	-0.8		-1.0		-0.5		-0.1		0.000		P
Vanadium	0.6	J	0.6	J	1.2	J	1.2	J	0.000		P
Zinc	2.6	J	1.7	J	2.4	J	2.5	J	0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM FIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	-0.1		-0.3		-0.1		0.9		0.000		P
Arsenic	0.0		0.0		0.2		0.3		0.000		P
Barium	1.4	J	1.7	J	2.2	J	2.3	J	0.000		P
Beryllium	0.2		0.0		0.2		0.8	J	0.000		P
Boron	-4.0		-8.5		-7.4		20.1		0.000		P
Cadmium	0.2	J	0.0		0.1		0.8	J	0.000		P
Calcium	119.1	J	-22.0		584.0		242.0	J	0.000		P
Chromium	-1.8		-1.8		-1.7		-1.4		0.000		P
Cobalt	0.2	J	0.0		0.2	J	0.4	J	0.000		P
Copper	1.3	J	0.7	J	1.1	J	1.3	J	0.000		P
Iron	9.1		51.4	J	51.1	J	81.3	J	0.000		P
Lead	0.1		0.1		0.2	J	1.0	J	0.000		P
Magnesium	21.4		7.1		32.1	J	94.3	J	0.000		P
Manganese	0.1		0.4		0.5		0.8		0.000		P
Molybdenum	0.0		-0.1		-0.1		2.1	J	0.000		P
Nickel	0.6	J	0.5	J	0.6	J	1.2	J	0.000		P
Potassium	16.2		-4.6		17.3		67.3	J	0.000		P
Selenium	2.1	J	3.2	J	2.9	J	1.4		0.000		P
Silver	0.9	J	0.8	J	0.9	J	1.4	J	0.000		P
Sodium	13.9		-70.0		-52.0		76.1	J	0.000		P
Strontium	0.4		0.1		1.2	J	1.0	J	0.000		P
Thallium	0.0		0.2		0.1		1.5	J	0.000		P
Tin	0.1		-0.1		0.1		1.1	J	0.000		P
Titanium	-0.8		-0.8		0.0		1.0	J	0.000		P
Vanadium	0.6	J	0.8	J	0.9	J	1.0	J	0.000		P
Zinc	2.6	J	1.7	J	2.4	J	1.5	J	0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	-0.1		-0.3		-0.3		1.1	J	0.000		P
Arsenic	0.0		-0.1		-0.1		0.4		0.000		P
Barium	1.4	J	3.0	J	1.2	J	2.6	J	0.000		P
Beryllium	0.2		0.0		0.0		0.8	J	0.000		P
Boron	-4.0		-2.8		-1.9		24.0		0.000		P
Cadmium	0.2	J	0.0		0.0		0.8	J	0.000		P
Calcium	119.1	J	385.0	J	56.9		281.0	J	0.000		P
Chromium	-1.8		-1.8		-1.9		-1.2		0.000		P
Cobalt	0.2	J	0.0		0.0		0.5	J	0.000		P
Copper	1.3	J	0.6	J	0.6	J	1.8	J	0.000		P
Iron	9.1		60.8	J	10.6		108.0	J	0.000		P
Lead	0.1		0.2		0.1		1.0	J	0.000		P
Magnesium	21.4		38.4	J	2.0		101.0	J	0.000		P
Manganese	0.1		8.5		0.5		1.4	J	0.000		P
Molybdenum	0.0		-0.1		0.0		2.1	J	0.000		P
Nickel	0.6	J	0.4	J	0.3	J	1.4	J	0.000		P
Potassium	16.2		7.3		10.7		89.5	J	0.000		P
Selenium	2.1	J	2.1	J	2.5	J	2.7	J	0.000		P
Silver	0.9	J	0.7	J	0.7	J	1.6	J	0.000		P
Sodium	13.9		-12.0		-4.6		94.4	J	0.000		P
Strontium	0.4		0.4	J	0.1		1.1	J	0.000		P
Thallium	0.0		-0.1		0.0		1.7	J	0.000		P
Tin	0.1		-0.1		-0.1		1.1	J	0.000		P
Titanium	-0.8		0.3		0.0		1.1	J	0.000		P
Vanadium	0.6	J	0.8	J	0.7	J	1.2	J	0.000		P
Zinc	2.6	J	1.6	J	1.5	J	1.7	J	0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	-0.1		-0.1						0.000		P
Arsenic	0.0		0.1						0.000		P
Barium	1.4	J	1.5	J					0.000		P
Beryllium	0.2		0.0						0.000		P
Boron	-4.0		-2.6						0.000		P
Cadmium	0.2	J	-0.1						0.000		P
Calcium	119.1	J	20.2						0.000		P
Chromium	-1.8		-1.7						0.000		P
Cobalt	0.2	J	-0.1						0.000		P
Copper	1.3	J	1.0	J					0.000		P
Iron	9.1		-5.7						0.000		P
Lead	0.1		0.0						0.000		P
Magnesium	21.4		-1.8						0.000		P
Manganese	0.1		0.2						0.000		P
Molybdenum	0.0		-0.2						0.000		P
Nickel	0.6	J	0.6	J					0.000		P
Potassium	16.2		-4.9						0.000		P
Selenium	2.1	J	1.6						0.000		P
Silver	0.9	J	0.8	J					0.000		P
Sodium	13.9		-1.4						0.000		P
Strontium	0.4		0.0						0.000		P
Thallium	0.0		-0.2						0.000		P
Tin	0.1		-0.1						0.000		P
Titanium	-0.8		-0.1						0.000		P
Vanadium	0.6	J	1.3	J					0.000		P
Zinc	2.6	J	1.9	J					0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	4.6	J	4.2	J	3.7	J	4.0	J	0.633		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	4.6	J	3.9	J	27.8		26.9		0.633		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	4.6	J	45.1		32.5		20.7		0.633		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

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Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank			
		C	1	C	2	C	3	C		C	M	
Aluminum	4.6	J	46.7		5.3	J	28.2		0.633		P	

Note: MDLs are used, not IDLs

FORM III - IN



3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
	C		1	C	2	C	3	C	C		
Aluminum	4.6	J	8.0	J					0.633		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080227A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
	C		1	C	2	C	3	C	C		
Lithium	-0.4		-0.8		-0.8		-0.8		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080227A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
	C		1	C	2	C	3	C	C		
Lithium	-0.4		-0.7		-0.8				0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

Last Calib: Feb 28, 2008 12:10 pm  
 Calibration Type: External Calibration Method  
 Calibration Title: ICP\_OR.S  
 Weighting Method: 1/(SD\*SD)  
 Mass Interpolation Fit for VIS: Point to Point  
 Method: C:\ICPCHEM\1\METHODS\ICP\_OR.S.M  
 Multi Tune: #1 012807a5.u  
 #2 012807he.u

=== Standard Files ===

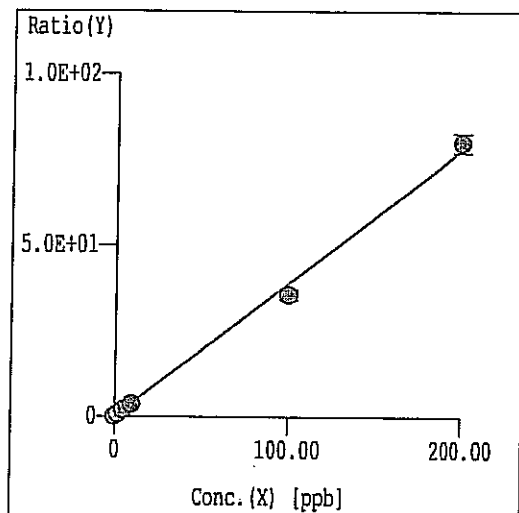
<Data Correction>

Bkg File: ---  
 Rejected Masses: ---  
 Interference Correction: ON

	Data File	Sample Name	Date Acquired
1	c:\icpchem\1\data\08b20m00.b\003calb.d\003calb.d#	CAL BLK	Feb 20 2008 12:23 pm
2	c:\icpchem\1\data\08b20m00.b\004cals.d\004cals.d#	2/10/200	Feb 20 2008 12:29 pm
3	c:\icpchem\1\data\08b20m00.b\005cals.d\005cals.d#	5/25/500	Feb 20 2008 12:35 pm
4	c:\icpchem\1\data\08b20m00.b\006cals.d\006cals.d#	10/50/1000	Feb 20 2008 12:41 pm
5	c:\icpchem\1\data\08b20m00.b\007cals.d\007cals.d#	100/500/10K	Feb 20 2008 12:47 pm
6	c:\icpchem\1\data\08b20m00.b\008cals.d\008cals.d#	200/1000/20K	Feb 20 2008 12:53 pm
7	---		
8	---		
9	---		
10	---		
11	---		
12	---		
13	---		
14	---		
15	---		
16	---		
17	---		
18	---		
19	---		
20	---		

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 9 Be                    6      ppb

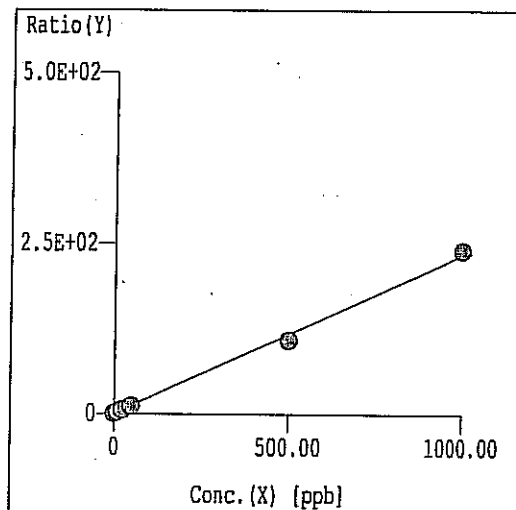


	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	3.333	1.759E-03	P 102.0
2		2.000	1.889	1448	7.407E-01	P 1.467
3		5.000	4.891	3699	1.916E+00	P 3.527
4		10.00	9.195	7071	3.600E+00	P 6.675
5		100.0	91.14	7.014E+04	3.566E+01	P 4.152
6		200.0	204.5	1.439E+05	8.001E+01	P 3.484
7		50.00				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9986$   
 $Y = 3.913E-001 \cdot X + 1.759E-003$   
 $X = 2.556E+000 \cdot Y - 4.495E-003$   
DL = 1.375E-02 ppb  
BEC = 4.495E-03 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 11 B                    6      ppb



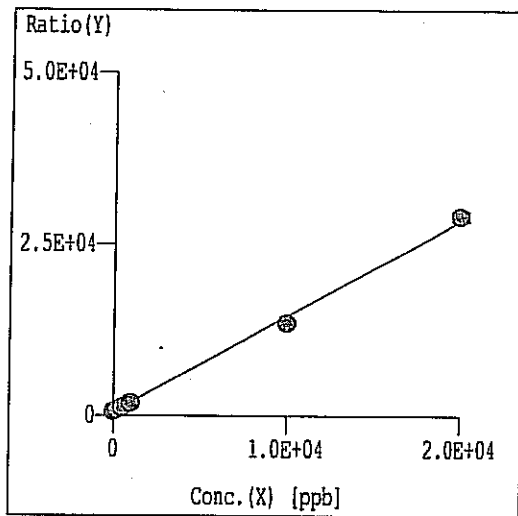
	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	754.5	3.870E-01	P 7.702
2		10.00	9.211	4981	2.550E+00	P 3.926
3		25.00	23.31	1.131E+04	5.861E+00	P 3.231
4		50.00	45.88	2.194E+04	1.116E+01	P 4.728
5		500.0	458.3	2.126E+05	1.080E+02	P 2.369
6		1000	1021	4.322E+05	2.402E+02	P 1.538
7		250.0				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9988$   
 $Y = 2.348E-001 \cdot X + 3.870E-001$   
 $X = 4.258E+000 \cdot Y - 1.648E+000$   
DL = 3.807E-01 ppb  
BEC = 1.648 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 23 Na                72    ppb

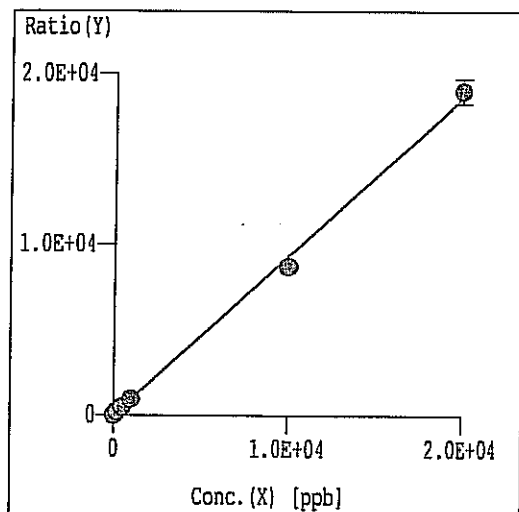


	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	9.979E+05	5.651E+02	A	4.091
2		200.0	189.1	1.476E+06	8.297E+02	A	3.485
3		500.0	436.2	2.167E+06	1.175E+03	A	3.691
4		1000	904.7	3.453E+06	1.831E+03	A	2.464
5		1.000E+04	9231	2.592E+07	1.348E+04	A	2.435
6		2.000E+04	2.039E+04	5.228E+07	2.909E+04	A	2.520
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9990$   
 $Y = 1.399E+000 \cdot X + 5.651E+002$   
 $X = 7.147E-001 \cdot Y - 4.039E+002$   
DL = 49.57 ppb  
BEC = 403.9 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 24 Mg                72    ppb



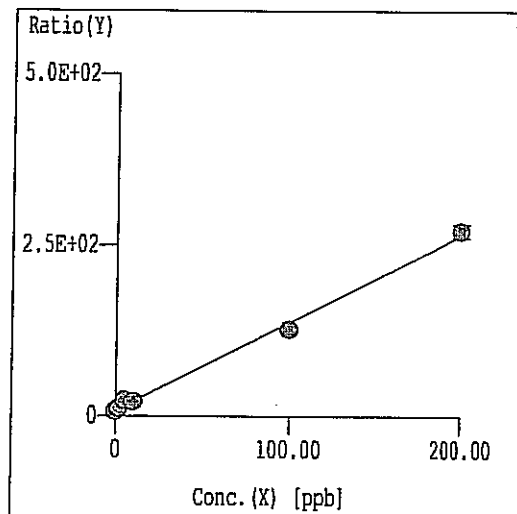
	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	3240	1.848E+00	P	34.34
2		200.0	226.8	3.800E+05	2.136E+02	P	4.438
3		500.0	504.7	8.719E+05	4.730E+02	A	3.874
4		1000	994.6	1.755E+06	9.304E+02	A	1.495
5		1.000E+04	9315	1.673E+07	8.698E+03	A	1.059
6		2.000E+04	2.034E+04	3.412E+07	1.899E+04	A	3.906
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9992$   
 $Y = 9.336E-001 \cdot X + 1.848E+000$   
 $X = 1.071E+000 \cdot Y - 1.980E+000$   
DL = 2.040 ppb  
BEC = 1.980 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 27 Al                72     ppb

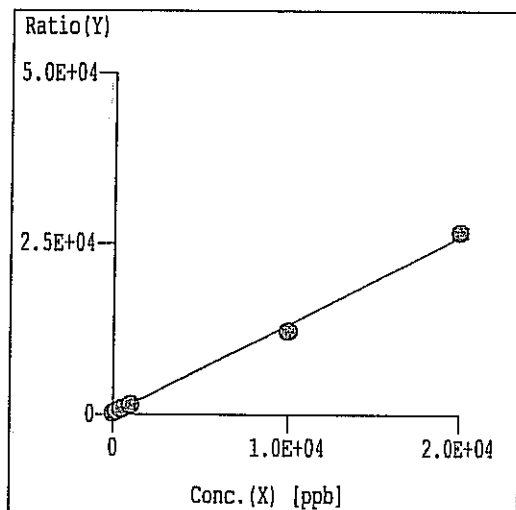


	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-1.440E+00	1.183E+04	6.743E+00	P 30.60
2		2.000	2.001	1.982E+04	1.117E+01	P 18.14
3		5.000	11.12	4.202E+04	2.290E+01	P 24.95
4		10.00	9.484	3.915E+04	2.080E+01	P 11.40
5		100.0	91.93	2.440E+05	1.269E+02	P 2.423
6		200.0	203.9	4.867E+05	2.710E+02	P 3.629
7		50.00				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:  $Y=aX+b$   
 $r = 0.9982$   
 $Y = 1.287E+000 \cdot X + 8.596E+000$   
 $X = 7.772E-001 \cdot Y - 6.680E+000$   
DL = 4.811 ppb  
BEC = 6.680 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 39 K                72     ppb



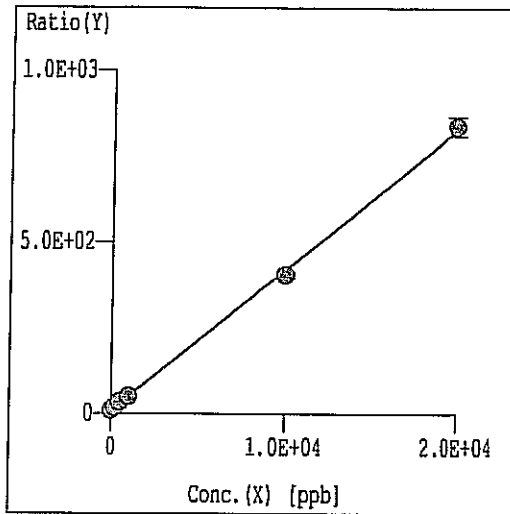
	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	2.733E+05	1.548E+02	P 4.489
2		200.0	219.5	7.830E+05	4.400E+02	P 3.004
3		500.0	486.3	1.450E+06	7.867E+02	A 4.478
4		1000	956.5	2.636E+06	1.398E+03	A 2.406
5		1.000E+04	9227	2.336E+07	1.215E+04	A 1.690
6		2.000E+04	2.039E+04	4.788E+07	2.665E+04	A 2.973
7		5000				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9990$   
 $Y = 1.299E+000 \cdot X + 1.548E+002$   
 $X = 7.695E-001 \cdot Y - 1.191E+002$   
DL = 16.04 ppb  
BEC = 119.1 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 44 Ca                72    ppb

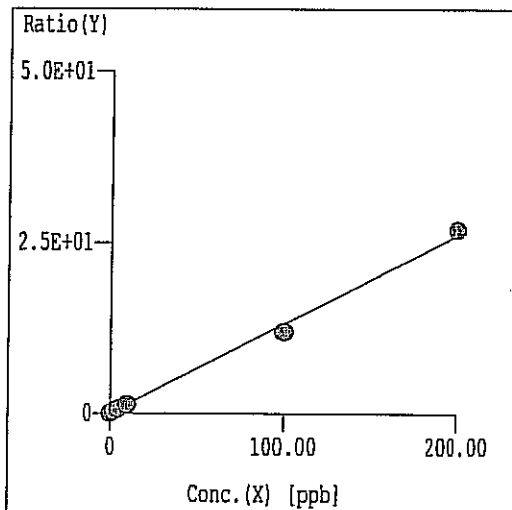


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	1.562E+04	8.859E+00	P	11.55
2		200.0	226.7	3.232E+04	1.817E+01	P	7.313
3		500.0	602.9	6.190E+04	3.363E+01	P	10.87
4		1000	989.7	9.336E+04	4.952E+01	P	4.376
5		1.000E+04	9628	7.777E+05	4.045E+02	P	2.247
6		2.000E+04	2.018E+04	1.506E+06	8.382E+02	A	3.382
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9997$   
 $Y = 4.109E-002 * X + 8.859E+000$   
 $X = 2.434E+001 * Y - 2.156E+002$   
DL = 74.70 ppb  
BEC = 215.6 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 47 Ti                72    ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	32.23	1.847E-02	P	60.22
2		2.000	2.075	518.9	2.913E-01	P	9.194
3		5.000	4.743	1185	6.421E-01	P	4.843
4		10.00	9.499	2389	1.267E+00	P	5.043
5		100.0	90.62	2.295E+04	1.193E+01	P	1.432
6		200.0	204.7	4.840E+04	2.694E+01	P	1.859
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

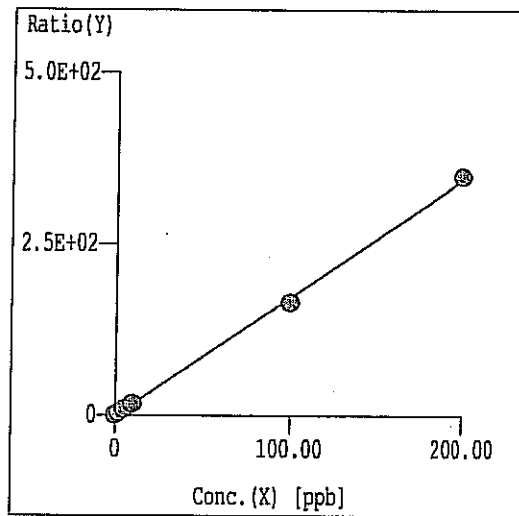
Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9985$   
 $Y = 1.315E-001 * X + 1.847E-002$   
 $X = 7.605E+000 * Y - 1.405E-001$   
DL = 2.538E-01 ppb  
BEC = 1.405E-01 ppb

Weight: OFF  
Min Conc: 0.000



## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 51 V                72    ppb

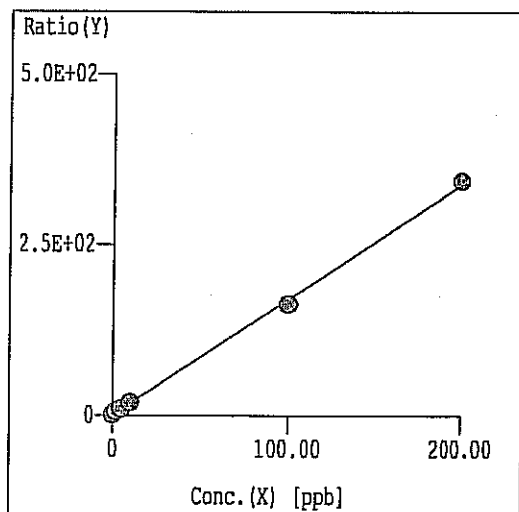


	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	7.749E-01	258.9	4.183E-01	P	21.09
2		2.000	2.600	2277	3.576E+00	P	3.313
3		5.000	5.582	5611	8.736E+00	P	1.265
4		10.00	10.23	1.113E+04	1.678E+01	P	2.280
5		100.0	95.69	1.105E+05	1.646E+02	P	4.247E-01
6		200.0	202.1	2.237E+05	3.488E+02	P	6.184E-01
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9996$   
 $Y = 1.730E+000 \cdot X - 9.222E-001$   
 $X = 5.780E-001 \cdot Y + 5.331E-001$   
 $DL = 1.530E-01$  ppb  
 $BEC = -5.331E-01$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 52 Cr                72    ppb



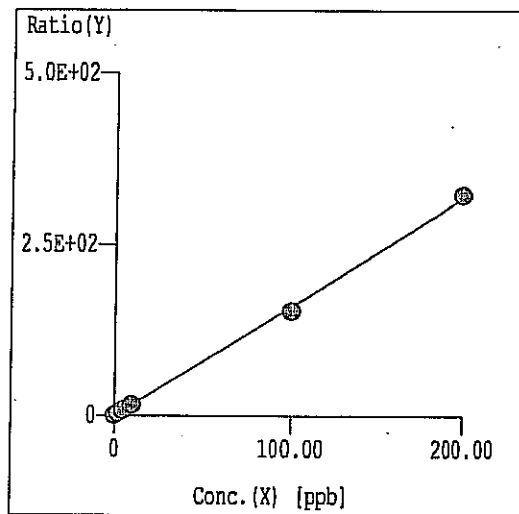
	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	595.6	9.606E-01	P	10.98
2		2.000	2.831	3663	5.756E+00	P	2.327
3		5.000	5.017	6076	9.460E+00	P	2.258
4		10.00	10.41	1.234E+04	1.860E+01	P	1.683
5		100.0	95.36	1.091E+05	1.625E+02	P	5.113E-01
6		200.0	202.3	2.204E+05	3.437E+02	P	1.661
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9996$   
 $Y = 1.694E+000 \cdot X + 9.606E-001$   
 $X = 5.903E-001 \cdot Y - 5.670E-001$   
 $DL = 1.868E-01$  ppb  
 $BEC = 5.670E-01$  ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 55 Mn                72      ppb

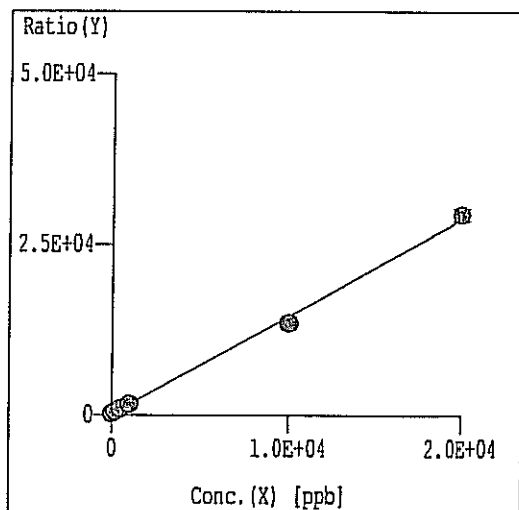


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	223.3	3.598E-01	P	8.489
2		2.000	2.129	2386	3.753E+00	P	9.986
3		5.000	4.911	5260	8.189E+00	P	1.288
4		10.00	9.832	1.064E+04	1.603E+01	P	1.579
5		100.0	95.80	1.027E+05	1.531E+02	P	6.114E-01
6		200.0	202.1	2.069E+05	3.225E+02	P	1.095
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9997$   
 $Y = 1.594E+000 \cdot X + 3.598E-001$   
 $X = 6.274E-001 \cdot Y - 2.257E-001$   
DL = 5.749E-02 ppb  
BEC = 2.257E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 56 Fe                72      ppb



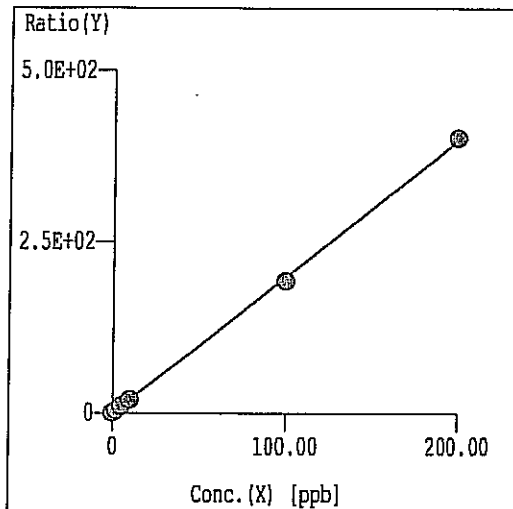
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	3.285E+05	1.861E+02	P	7.005
2		200.0	203.5	8.512E+05	4.783E+02	A	2.912
3		500.0	504.2	1.678E+06	9.100E+02	A	2.787
4		1000	972.1	2.982E+06	1.582E+03	A	3.360
5		1.000E+04	9266	2.595E+07	1.349E+04	A	1.139E-01
6		2.000E+04	2.037E+04	5.287E+07	2.943E+04	A	3.055
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9991$   
 $Y = 1.436E+000 \cdot X + 1.861E+002$   
 $X = 6.965E-001 \cdot Y - 1.296E+002$   
DL = 27.25 ppb  
BEC = 129.6 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 59 Co                72     ppb

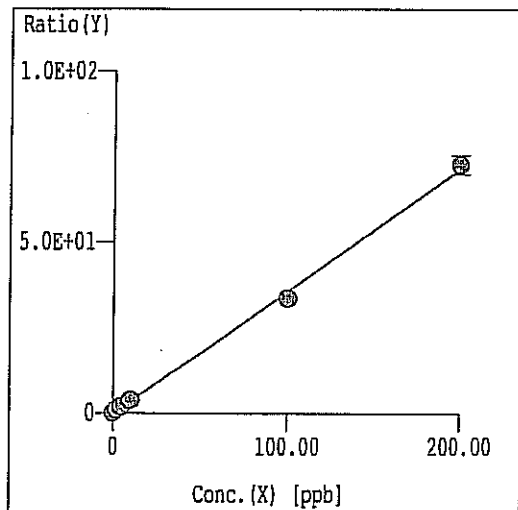


	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	13.33	2.149E-02	P	24.86
2		2.000	1.979	2526	3.966E+00	P	3.662
3		5.000	5.075	6513	1.014E+01	P	2.300
4		10.00	9.802	1.298E+04	1.956E+01	P	3.301
5		100.0	96.92	1.297E+05	1.932E+02	P	9.118E-01
6		200.0	201.5	2.577E+05	4.017E+02	P	4.764E-01
7		50.00					
8							
9							
10							
11							
12							
13							
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17							
18							
19							
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Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9998$   
 $Y = 1.993E+000 \cdot X + 2.149E-002$   
 $X = 5.018E-001 \cdot Y - 1.078E-002$   
DL = 8.041E-03 ppb  
BEC = 1.078E-02 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 60 Ni                72     ppb



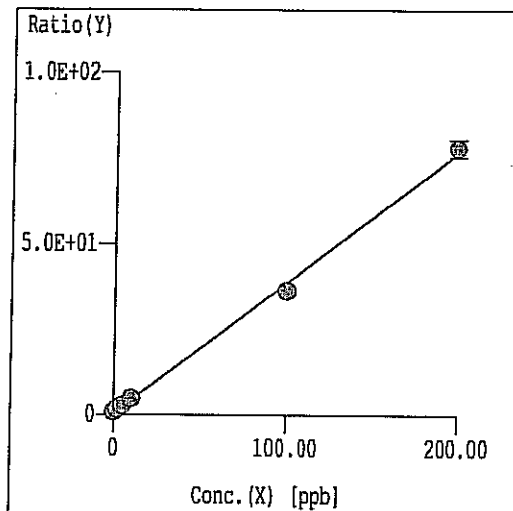
	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	5.550E-01	161.1	9.153E-02	P	17.67
2		2.000	3.159	1826	1.025E+00	P	1.857
3		5.000	5.613	3512	1.906E+00	P	7.160
4		10.00	10.82	7115	3.772E+00	P	1.026
5		100.0	93.85	6.453E+04	3.356E+01	P	1.578
6		200.0	203.0	1.306E+05	7.271E+01	P	3.780
7		50.00					
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Curve Fit:       $Y=aX+b$   
 $r = 0.9993$   
 $Y = 3.587E-001 \cdot X - 1.076E-001$   
 $X = 2.788E+000 \cdot Y + 2.998E-001$   
DL = 1.353E-01 ppb  
BEC = -2.998E-01 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 65 Cu                72     ppb

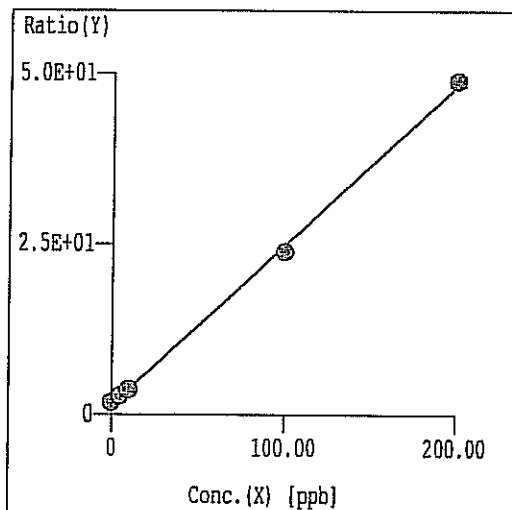


	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	6.201E-01	1331	7.533E-01	P	6.591
2		2.000	2.995	2953	1.660E+00	P	5.764
3		5.000	5.671	4945	2.681E+00	P	1.425
4		10.00	11.00	8888	4.715E+00	P	3.823
5		100.0	93.59	6.968E+04	3.624E+01	P	2.242
6		200.0	203.1	1.402E+05	7.806E+01	P	3.294
7		50.00					
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19							
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Curve Fit:       $Y=aX+b$   
 $r = 0.9992$   
 $Y = 3.817E-001 * X + 5.166E-001$   
 $X = 2.620E+000 * Y - 1.353E+000$   
 $DL = 3.902E-01$  ppb  
 $BEC = 1.353$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 66 Zn                72     ppb



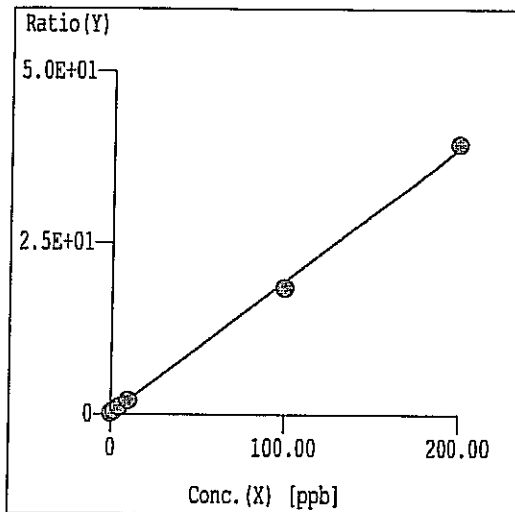
	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.719	1065	1.716E+00	P	4.986
2		2.000		1395	2.192E+00	P	1.769
3		5.000	5.741	1710	2.663E+00	P	2.979
4		10.00	9.749	2392	3.607E+00	P	4.582
5		100.0	95.59	1.599E+04	2.382E+01	P	6.681E-01
6		200.0	202.2	3.137E+04	4.891E+01	P	1.569
7							
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Curve Fit:       $Y=aX+b$   
 $r = 0.9995$   
 $Y = 2.354E-001 * X + 1.311E+000$   
 $X = 4.248E+000 * Y - 5.570E+000$   
 $DL = 1.090$  ppb  
 $BEC = 5.570$  ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 75 As                72    ppb

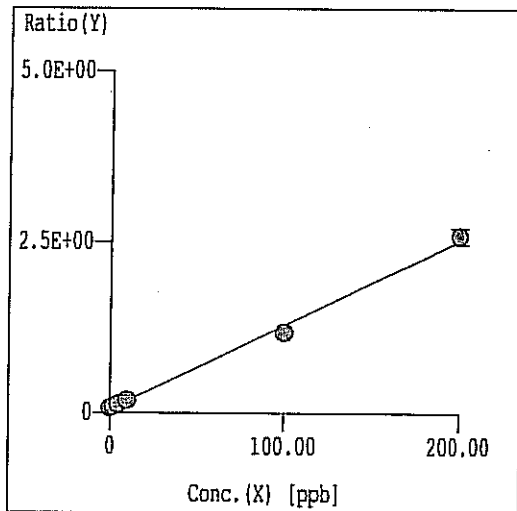


	Rict	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	75.19	1.212E-01	P 9.323
2		2.000	1.909	312.6	4.909E-01	P 5.916
3		5.000	4.910	689.3	1.072E+00	P 5.118
4		10.00	9.614	1315	1.983E+00	P 4.979
5		100.0	94.56	1.237E+04	1.843E+01	P 8.060E-01
6		200.0	202.7	2.526E+04	3.938E+01	P 7.557E-01
7		50.00				
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Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9995$   
 $Y = 1.936E-001 \cdot X + 1.212E-001$   
 $X = 5.164E+000 \cdot Y - 6.261E-001$   
DL = 1.751E-01 ppb  
BEC = 6.261E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 82 Se                72    ppb



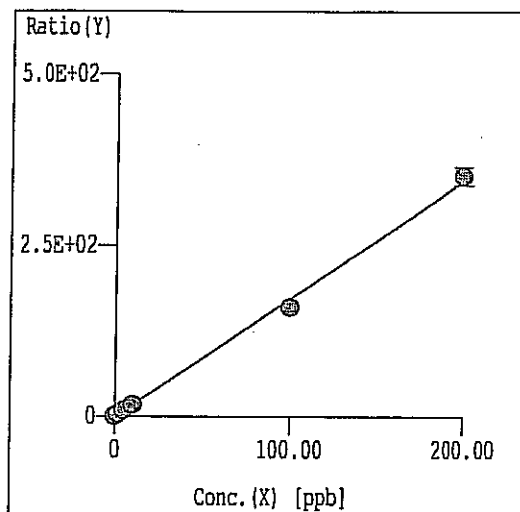
	Rict	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	1.539	117.4	6.648E-02	P 8.964
2		2.000	3.378	158.9	8.936E-02	P 10.34
3		5.000	6.141	227.8	1.237E-01	P 9.522
4		10.00	10.58	337.4	1.789E-01	P 2.951
5		100.0	90.87	2265	1.178E+00	P 2.671
6		200.0	204.5	4653	2.591E+00	P 4.567
7		50.00				
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Curve Fit:       $Y=aX+b$   
 $r = 0.9984$   
 $Y = 1.244E-002 \cdot X + 4.734E-002$   
 $X = 8.040E+001 \cdot Y - 3.806E+000$   
DL = 1.437 ppb  
BEC = 3.806 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 88 Sr                72     ppb

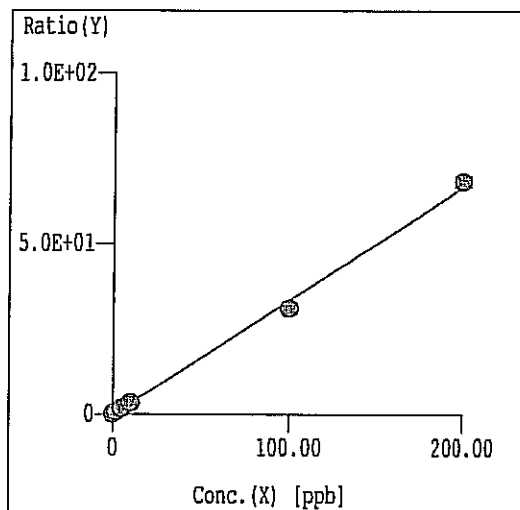


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	180.0	1.032E-01	P	56.13
2		2.000	2.019	6379	3.585E+00	P	4.342
3		5.000	5.001	1.609E+04	8.729E+00	P	5.031
4		10.00	9.696	3.172E+04	1.683E+01	P	5.004
5		100.0	92.60	3.073E+05	1.598E+02	P	1.842
6		200.0	203.7	6.313E+05	3.515E+02	P	3.834
7		50.00					
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Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9990$   
 $Y = 1.725E+000 \cdot X + 1.032E-001$   
 $X = 5.798E-001 \cdot Y - 5.983E-002$   
DL = 1.007E-01 ppb  
BEC = 5.983E-02 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 95 Mo                72     ppb



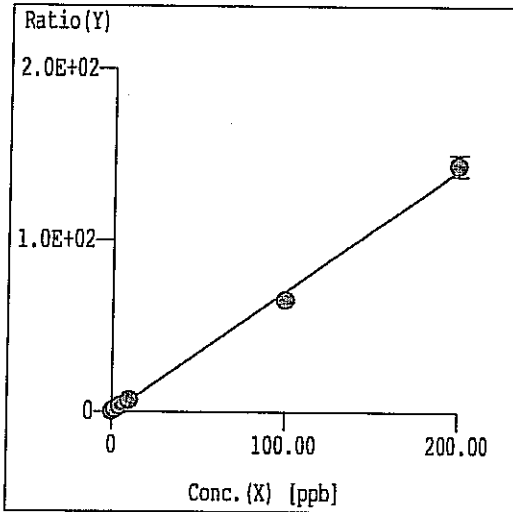
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	26.67	1.522E-02	P	35.61
2		2.000	1.967	1199	6.738E-01	P	2.750
3		5.000	4.893	3048	1.653E+00	P	2.258
4		10.00	9.764	6191	3.283E+00	P	2.735
5		100.0	92.34	5.948E+04	3.092E+01	P	7.038E-01
6		200.0	203.8	1.226E+05	6.824E+01	P	2.328
7		50.00					
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Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9990$   
 $Y = 3.347E-001 \cdot X + 1.522E-002$   
 $X = 2.988E+000 \cdot Y - 4.547E-002$   
DL = 4.858E-02 ppb  
BEC = 4.547E-02 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 109 Ag                72     ppb

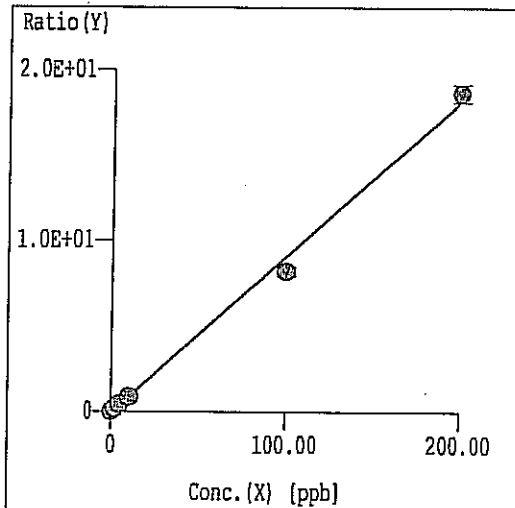


	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	1.091	130.0	7.412E-02	P 32.21
2		2.000	3.071	2637	1.482E+00	P 3.752
3		5.000	5.858	6386	3.463E+00	P 2.846
4		10.00	10.60	1.289E+04	6.835E+00	P 9.164E-01
5		100.0	92.88	1.256E+05	6.533E+01	P 1.784
6		200.0	203.5	2.586E+05	1.440E+02	P 4.363
7		50.00				
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Curve Fit:       $Y=aX+b$   
 $r = 0.9990$   
 $Y = 7.109E-001 \cdot X - 7.014E-001$   
 $X = 1.407E+000 \cdot Y + 9.867E-001$   
DL = 1.007E-01 ppb  
BEC = -9.867E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 111 Cd                115     ppb



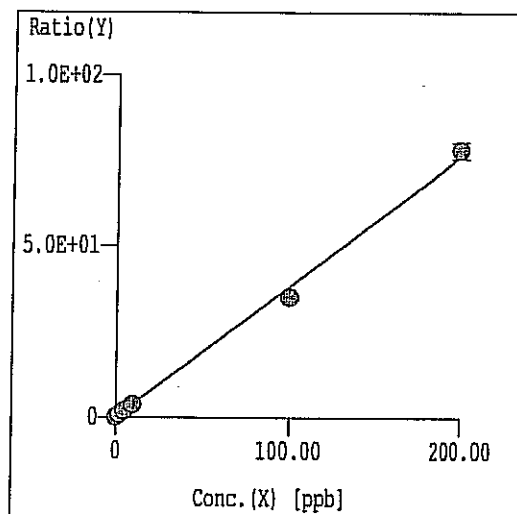
	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	2.222	7.695E-04	P 52.53
2		2.000	1.934	524.1	1.767E-01	P 11.79
3		5.000	4.719	1318	4.300E-01	P 3.396
4		10.00	9.350	2693	8.513E-01	P 2.732
5		100.0	90.04	2.603E+04	8.191E+00	P 3.316
6		200.0	205.0	5.429E+04	1.865E+01	P 2.800
7		50.00				
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Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9983$   
 $Y = 9.097E-002 \cdot X + 7.695E-004$   
 $X = 1.099E+001 \cdot Y - 8.459E-003$   
DL = 1.333E-02 ppb  
BEC = 8.459E-03 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 118 Sn                72     ppb

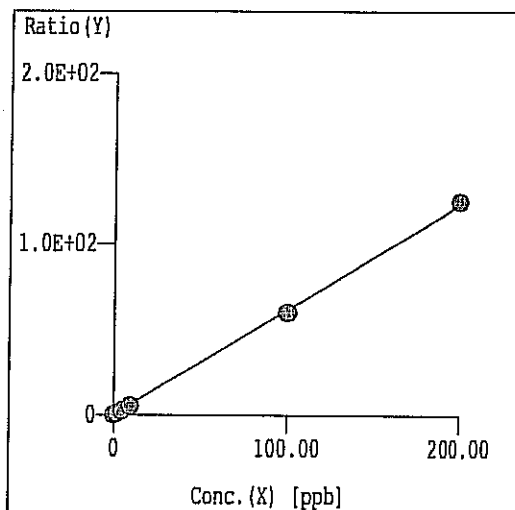


	Rict	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	52.22	2.963E-02	P 16.06
2		2.000	2.031	1433	8.054E-01	P 3.349
3		5.000	4.800	3435	1.863E+00	P 4.335
4		10.00	9.720	7056	3.743E+00	P 5.537
5		100.0	91.64	6.737E+04	3.504E+01	P 2.134
6		200.0	204.2	1.402E+05	7.804E+01	P 3.097
7		50.00				
8						
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19						
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Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9988$   
 $Y = 3.820E-001 \cdot X + 2.963E-002$   
 $X = 2.618E+000 \cdot Y - 7.756E-002$   
DL = 3.738E-02 ppb  
BEC = 7.756E-02 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 121 Sb                72     ppb



	Rict	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	15.56	2.521E-02	P 39.03
2		2.000	1.362	552.2	8.677E-01	P 1.738
3		5.000	3.757	1509	2.349E+00	P 2.939
4		10.00	8.356	3447	5.195E+00	P 3.834E-01
5		100.0	96.80	4.022E+04	5.991E+01	P 6.464E-01
6		200.0	201.7	8.008E+04	1.248E+02	P 3.948E-01
7		50.00				
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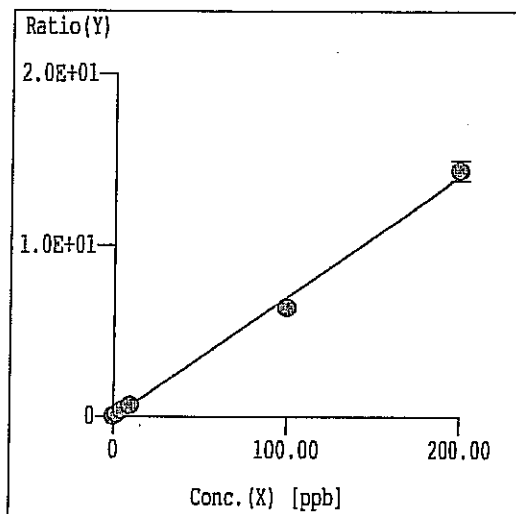
Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9998$   
 $Y = 6.187E-001 \cdot X + 2.521E-002$   
 $X = 1.616E+000 \cdot Y - 4.075E-002$   
DL = 4.771E-02 ppb  
BEC = 4.075E-02 ppb

Weight: OFF  
Min Conc: 0.000



## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 135 Ba            115    ppb

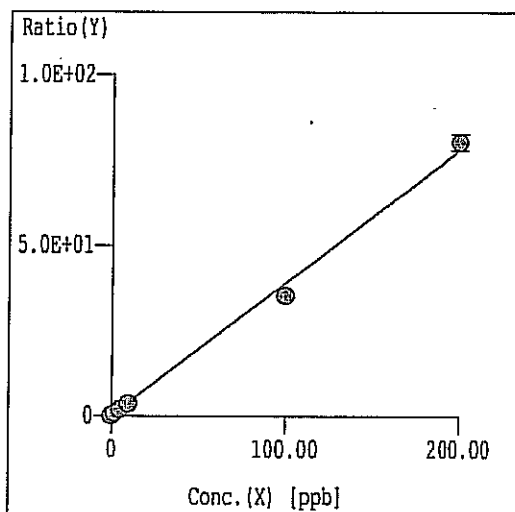


	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.311	22.22	7.729E-03	P	50.38
2		2.000	3.257	432.2	1.455E-01	P	10.66
3		5.000	6.270	1099	3.587E-01	P	6.151
4		10.00	10.52	2082	6.599E-01	P	11.47
5		100.0	91.42	2.029E+04	6.386E+00	P	3.455
6		200.0	204.2	4.183E+04	1.437E+01	P	4.112
7		50.00					
8							
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18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9986$   
 $Y = 7.079E-002 \cdot X - 8.510E-002$   
 $X = 1.413E+001 \cdot Y + 1.202E+000$   
 $DL = 1.650E-01$  ppb  
 $BEC = -1.202E+00$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 203 Tl            209    ppb



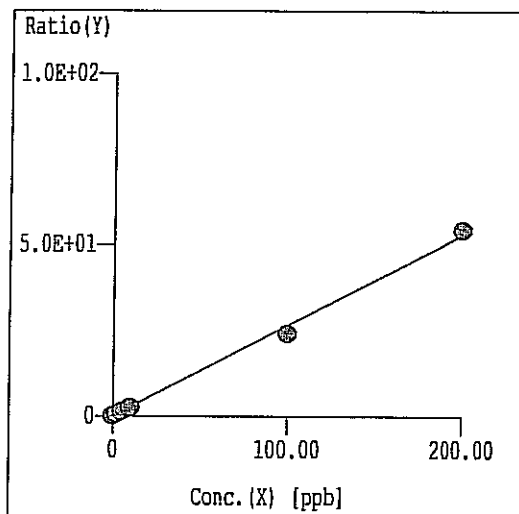
	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	27.78	1.691E-02	P	3.678
2		2.000	1.913	1248	7.662E-01	P	10.39
3		5.000	4.710	3115	1.861E+00	P	6.259
4		10.00	9.094	6180	3.578E+00	P	1.072
5		100.0	90.00	6.073E+04	3.526E+01	P	1.758
6		200.0	205.1	1.259E+05	8.031E+01	P	2.957
7		50.00					
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Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9983$   
 $Y = 3.916E-001 \cdot X + 1.691E-002$   
 $X = 2.554E+000 \cdot Y - 4.319E-002$   
 $DL = 4.765E-03$  ppb  
 $BEC = 4.319E-02$  ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 207 Pb            209    ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	73.34	4.483E-02	P	15.05
2		2.000	1.986	932.3	5.713E-01	P	2.612
3		5.000	4.743	2178	1.302E+00	P	7.263
4		10.00	9.146	4262	2.470E+00	P	4.425
5		100.0	90.62	4.144E+04	2.407E+01	P	2.583
6		200.0	204.7	8.514E+04	5.432E+01	P	1.597
7		50.00					
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Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9985$   
 $Y = 2.651E-001 * X + 4.483E-002$   
 $X = 3.772E+000 * Y - 1.691E-001$   
 $DL = 7.632E-02 \text{ ppb}$   
 $BEC = 1.691E-01 \text{ ppb}$

Weight: OFF  
 Min Conc: 0.000

Last Calib: Feb 28, 2008 12:10 pm  
 Calibration Type: External Calibration Method  
 Calibration Title: ICP\_OR5  
 Weighting Method: 1/(SD\*SD)  
 Mass Interpolation Fit for VIS: Point to Point  
 Method: C:\ICPCHEM\1\METHODS\ICP\_OR5.M  
 Mult Tune: #1 012807a5.u  
 #2 012807he.u

=== Standard Files ===

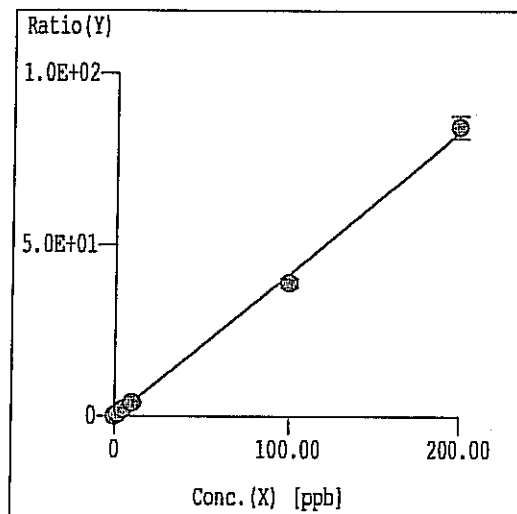
<Data Correction>

Bkg File: --  
 Rejected Masses: --  
 Interference Correction: ON

	Data File	Sample Name	Date Acquired
1	c:\icpchem\1\data\08b21\00.b\011calb.d\011calb.d#	CAL BLK	Feb 21 2008 12:26 pm
2	c:\icpchem\1\data\08b21\00.b\004cals.d\004cals.d#	2/10/200	Feb 21 2008 11:44 am
3	c:\icpchem\1\data\08b21\00.b\005cals.d\005cals.d#	5/25/500	Feb 21 2008 11:50 am
4	c:\icpchem\1\data\08b21\00.b\006cals.d\006cals.d#	10/50/1000	Feb 21 2008 11:56 am
5	c:\icpchem\1\data\08b21\00.b\007cals.d\007cals.d#	100/500/10K	Feb 21 2008 12:02 pm
6	c:\icpchem\1\data\08b21\00.b\008cals.d\008cals.d#	200/1000/20K	Feb 21 2008 12:08 pm
7	--		
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=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 9 Be                  6      ppb

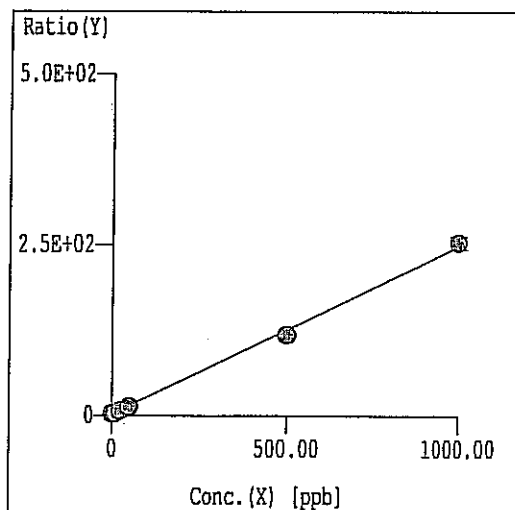


	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	32.22	1.659E-02	P 76.47
2		2.000	1.769	1598	7.516E-01	P 6.638
3		5.000	4.870	3994	2.041E+00	P 8.520
4		10.00	9.383	7721	3.916E+00	P 6.825
5		100.0	93.78	7.603E+04	3.899E+01	P 3.568
6		200.0	203.1	1.517E+05	8.444E+01	P 3.982
7		50.00				
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14						
15						
16						
17						
18						
19						
20						

Curve Fit:       $Y=aX+[\text{blank}]$   
 $r = 0.9993$   
 $Y = 4.156E-001 \cdot X + 1.659E-002$   
 $X = 2.406E+000 \cdot Y - 3.991E-002$   
DL = 9.157E-02 ppb  
BEC = 3.991E-02 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 11 B                  6      ppb



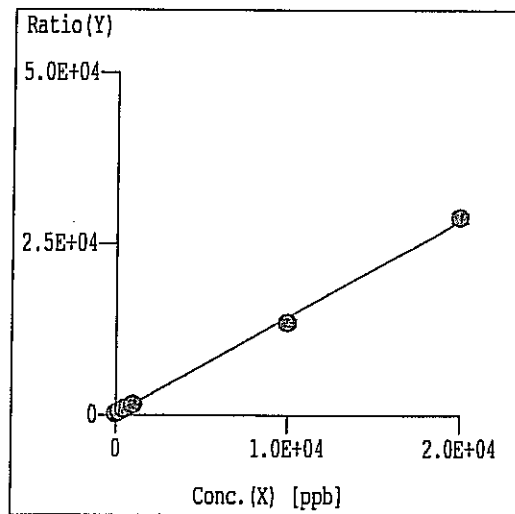
	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	5157	2.640E+00	P 7.828
2		10.00	3.398E-02	5636	2.648E+00	P 7.662E-01
3		25.00	16.49	1.314E+04	6.708E+00	P 3.129
4		50.00	39.86	2.460E+04	1.247E+01	P 3.932
5		500.0	466.6	2.296E+05	1.177E+02	P 2.409
6		1000	1018	4.556E+05	2.536E+02	P 3.819
7		250.0				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:       $Y=aX+[\text{blank}]$   
 $r = 0.9993$   
 $Y = 2.466E-001 \cdot X + 2.640E+000$   
 $X = 4.055E+000 \cdot Y - 1.070E+001$   
DL = 2.514 ppb  
BEC = 10.70 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 23 Na                72     ppb

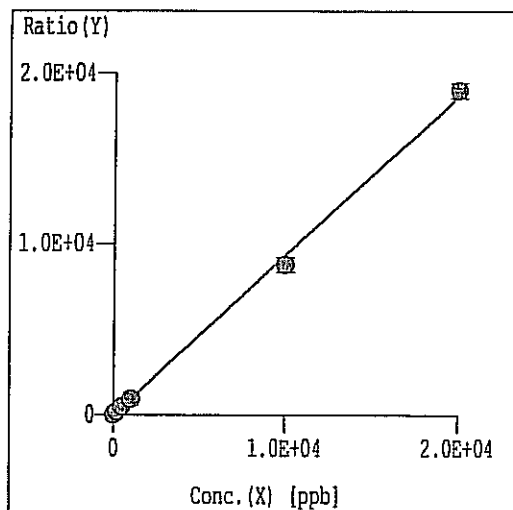


	Rjct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	4.138E+05	1.952E+02	P	1.487
2		200.0	188.5	1.061E+06	4.610E+02	A	1.905
3		500.0	512.4	1.946E+06	9.178E+02	A	3.000
4		1000	960.8	3.357E+06	1.550E+03	A	4.987
5		1.000E+04	9402	2.902E+07	1.345E+04	A	4.358
6		2.000E+04	2.030E+04	5.730E+07	2.882E+04	A	2.565
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9994$   
 $Y = 1.410E+000 * X + 1.952E+002$   
 $X = 7.091E-001 * Y - 1.384E+002$   
DL = 6.176 ppb  
BEC = 138.4 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 24 Mg                72     ppb



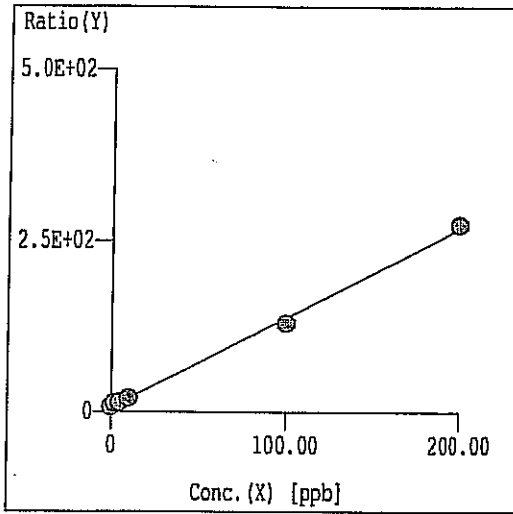
	Rjct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	1.061E+04	5.003E+00	P	8.233E-01
2		200.0	198.0	4.375E+05	1.901E+02	P	1.630
3		500.0	510.8	1.023E+06	4.825E+02	A	2.858
4		1000	981.8	1.998E+06	9.228E+02	A	5.358
5		1.000E+04	9367	1.889E+07	8.762E+03	A	4.884
6		2.000E+04	2.032E+04	3.777E+07	1.900E+04	A	2.402
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9993$   
 $Y = 9.348E-001 * X + 5.003E+000$   
 $X = 1.070E+000 * Y - 5.352E+000$   
DL = 1.322E-01 ppb  
BEC = 5.352 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 27 Al                72      ppb

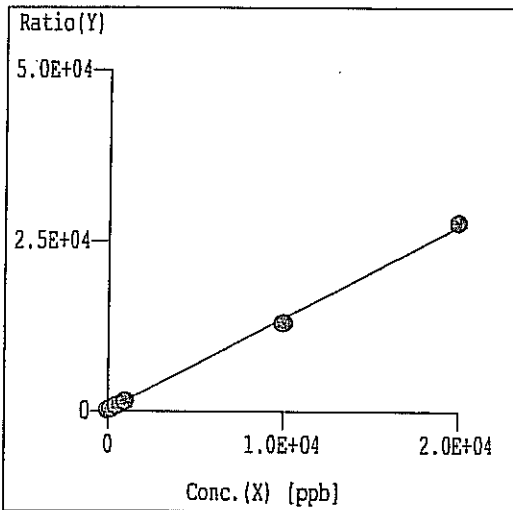


	Rt	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.818E-01	1.498E+04	7.072E+00	P	7.427
2		2.000	4.775	3.023E+04	1.311E+01	P	27.45
3		5.000	5.376	2.944E+04	1.390E+01	P	6.213
4		10.00	9.933	4.303E+04	1.988E+01	P	7.318
5		100.0	93.54	2.797E+05	1.297E+02	P	4.268
6		200.0	203.2	5.443E+05	2.738E+02	P	2.253
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9991$   
 $Y = 1.314E+000 \cdot X + 6.833E+000$   
 $X = 7.612E-001 \cdot Y - 5.202E+000$   
DL = 1.199 ppb  
BEC = 5.202 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 39 K                72      ppb



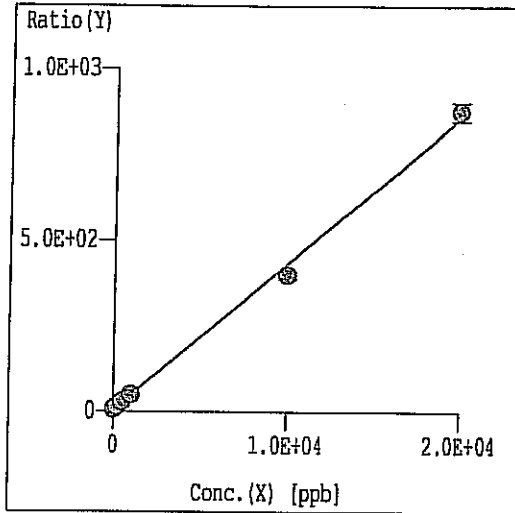
	Rt	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	3.129E+05	1.476E+02	P	2.419
2		200.0	167.8	8.637E+05	3.753E+02	A	1.738
3		500.0	490.0	1.722E+06	8.125E+02	A	3.671
4		1000	949.9	3.110E+06	1.436E+03	A	5.295
5		1.000E+04	9442	2.795E+07	1.296E+04	A	2.971
6		2.000E+04	2.028E+04	5.500E+07	2.767E+04	A	2.159
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9995$   
 $Y = 1.357E+000 \cdot X + 1.476E+002$   
 $X = 7.370E-001 \cdot Y - 1.088E+002$   
DL = 7.894 ppb  
BEC = 108.8 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD      Unit  
(1) 44 Ca                72        ppb

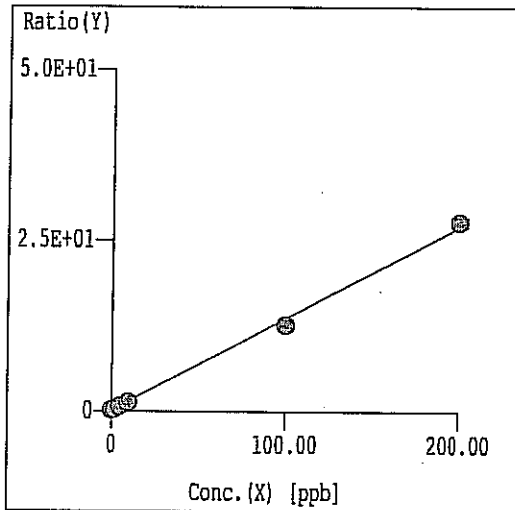


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	1.314E+04	6.199E+00	P	5.491
2		200.0	197.5	3.364E+04	1.462E+01	P	2.415
3		500.0	528.8	6.093E+04	2.875E+01	P	4.101
4		1000	1000	1.058E+05	4.885E+01	P	4.926
5		1.000E+04	9206	8.602E+05	3.988E+02	A	3.037
6		2.000E+04	2.040E+04	1.741E+06	8.760E+02	A	3.105
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:  $Y = aX + [\text{blank}]$   
 $r = 0.9989$   
 $Y = 4.264E-002 * X + 6.199E+000$   
 $X = 2.345E+001 * Y - 1.454E+002$   
DL = 23.95 ppb  
BEC = 145.4 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD      Unit  
(1) 47 Ti                72        ppb



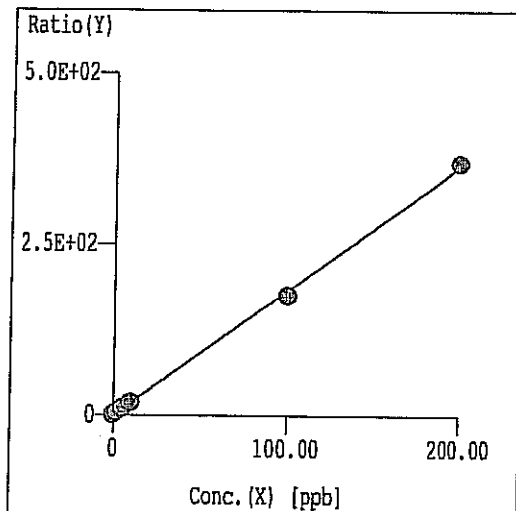
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	309.7	1.490E-01	P	146.1
2		2.000	7.510E-01	575.6	2.504E-01	P	11.85
3		5.000	3.973	1451	6.855E-01	P	9.656
4		10.00	8.505	2813	1.297E+00	P	2.630
5		100.0	92.11	2.715E+04	1.259E+01	P	2.674
6		200.0	204.1	5.507E+04	2.770E+01	P	2.414
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:  $Y = aX + [\text{blank}]$   
 $r = 0.9990$   
 $Y = 1.350E-001 * X + 1.490E-001$   
 $X = 7.406E+000 * Y - 1.103E+000$   
DL = 4.836 ppb  
BEC = 1.103 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 51 V                72    ppb

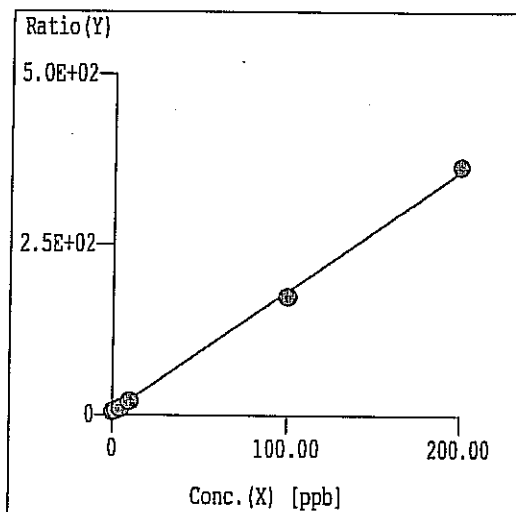


	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	5.074E-01	661.1	8.536E-01	P 9.278
2		2.000	2.709	3661	4.875E+00	P 2.066
3		5.000	5.577	7502	1.011E+01	P 1.218
4		10.00	10.25	1.384E+04	1.864E+01	P 5.467E-01
5		100.0	95.99	1.310E+05	1.752E+02	P 2.905E-01
6		200.0	202.0	2.605E+05	3.688E+02	P 6.571E-01
7		50.00				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:  $Y=aX+b$   
 $r = 0.9997$   
 $Y = 1.826E+000 \cdot X - 7.313E-002$   
 $X = 5.475E-001 \cdot Y + 4.004E-002$   
 $DL = 1.301E-01$  ppb  
 $BEC = -4.004E-02$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 52 Cr                72    ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	3368	4.351E+00	P 4.180E-01
2		2.000	1.063	4682	6.239E+00	P 3.639
3		5.000	2.989	7166	9.661E+00	P 8.191E-01
4		10.00	8.730	1.475E+04	1.986E+01	P 2.000
5		100.0	95.03	1.295E+05	1.732E+02	P 5.574E-01
6		200.0	202.6	2.574E+05	3.643E+02	P 6.405E-01
7		50.00				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

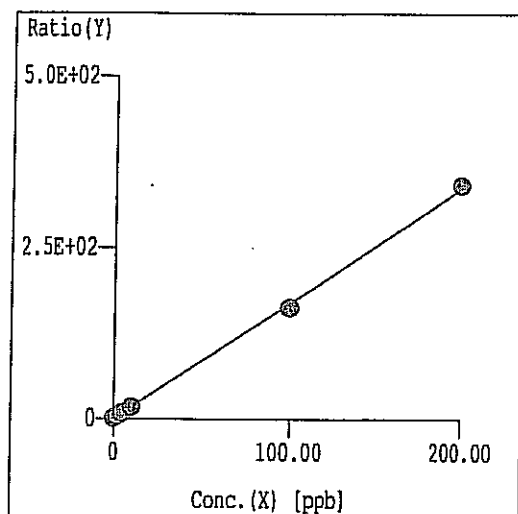
Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9996$   
 $Y = 1.777E+000 \cdot X + 4.351E+000$   
 $X = 5.628E-001 \cdot Y - 2.449E+000$   
 $DL = 3.071E-02$  ppb  
 $BEC = 2.449$  ppb

Weight: OFF  
Min Conc: 0.000



## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 55 Mn                72    ppb

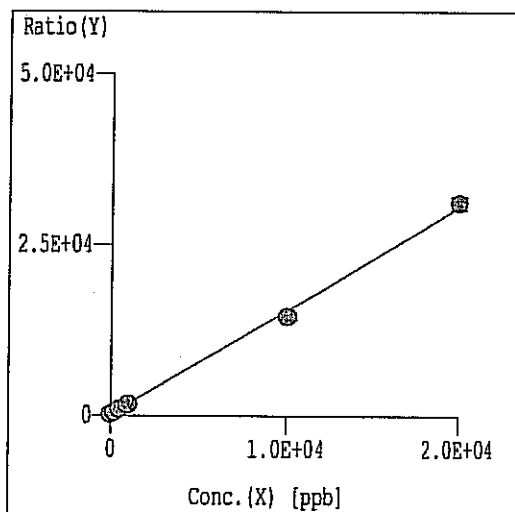


	Rjct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	515.6	6.660E-01	P	6.995
2		2.000	1.963	2988	3.979E+00	P	3.535
3		5.000	4.763	8457	8.705E+00	P	1.490
4		10.00	9.728	1.269E+04	1.709E+01	P	2.556
5		100.0	96.02	1.217E+05	1.627E+02	P	7.256E-01
6		200.0	202.0	2.414E+05	3.416E+02	P	3.107E-01
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[\text{blank}]$   
 $r = 0.9997$   
 $Y = 1.688E+000 \cdot X + 6.660E-001$   
 $X = 5.925E-001 \cdot Y - 3.946E-001$   
 $DL = 8.281E-02 \text{ ppb}$   
 $BEC = 3.946E-01 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 56 Fe                72    ppb



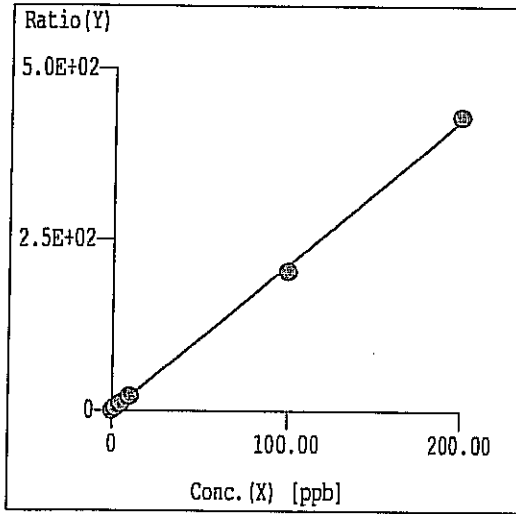
	Rjct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	4.367E+05	2.059E+02	P	1.793
2		200.0	161.5	1.040E+06	4.521E+02	A	1.075
3		500.0	483.7	2.000E+06	9.433E+02	A	3.344
4		1000	941.3	3.555E+06	1.641E+03	A	4.059
5		1.000E+04	9391	3.133E+07	1.452E+04	A	3.356
6		2.000E+04	2.031E+04	6.196E+07	3.117E+04	A	3.088
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[\text{blank}]$   
 $r = 0.9994$   
 $Y = 1.525E+000 \cdot X + 2.059E+002$   
 $X = 6.559E-001 \cdot Y - 1.351E+002$   
 $DL = 7.267 \text{ ppb}$   
 $BEC = 135.1 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 59 Co                72     ppb

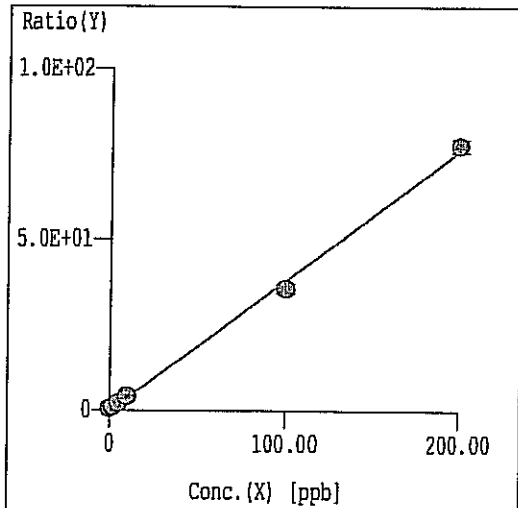


	Rt	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	102.2	1.321E-01	P	20.99
2		2.000	1.995	3280	4.369E+00	P	2.709
3		5.000	4.896	7813	1.053E+01	P	1.063
4		10.00	9.907	1.573E+04	2.118E+01	P	2.278
5		100.0	95.70	1.521E+05	2.034E+02	P	2.699E-01
6		200.0	202.2	3.035E+05	4.295E+02	P	1.514E-01
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9997$   
 $Y = 2.124E+000 \cdot X + 1.321E-001$   
 $X = 4.708E-001 \cdot Y - 6.219E-002$   
 $DL = 3.916E-02 \text{ ppb}$   
 $BEC = 6.219E-02 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 60 Ni                72     ppb



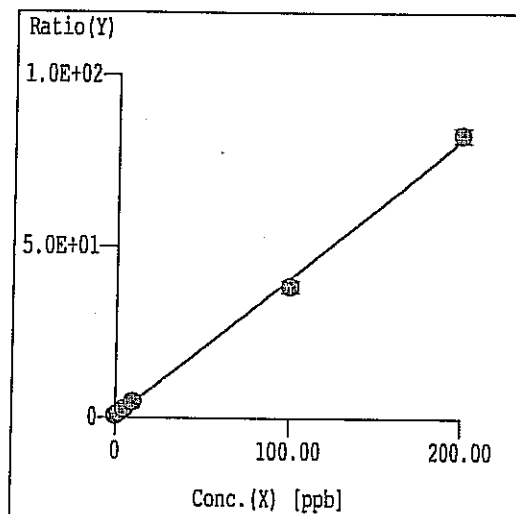
	Rt	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.349	1018	4.803E-01	P	8.692
2		2.000	2.703	2294	9.972E-01	P	5.718
3		5.000	5.496	4369	2.063E+00	P	9.343
4		10.00	10.78	8837	4.082E+00	P	5.931
5		100.0	93.45	7.687E+04	3.564E+01	P	3.993
6		200.0	203.2	1.541E+05	7.754E+01	P	2.468
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9992$   
 $Y = 3.817E-001 \cdot X - 3.477E-002$   
 $X = 2.620E+000 \cdot Y + 9.109E-002$   
 $DL = 3.281E-01 \text{ ppb}$   
 $BEC = -9.109E-02 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD      Unit  
(1) 65 Cu                72        ppb

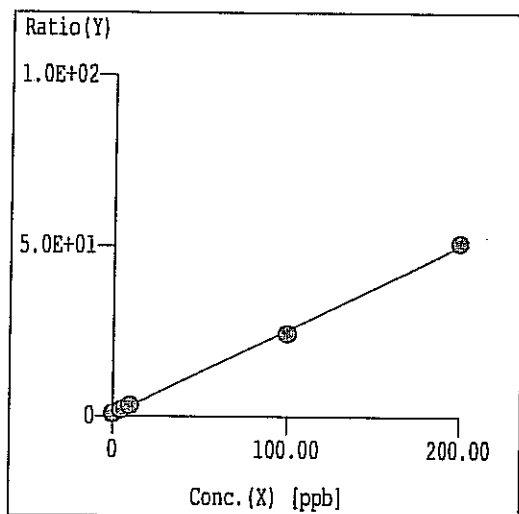


	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	8.040E-01	1157	5.452E-01	P 2.477
2		2.000	2.752	3076	1.337E+00	P 2.769
3		5.000	5.683	5357	2.528E+00	P 5.533
4		10.00	10.78	9957	4.600E+00	P 6.972
5		100.0	94.08	8.292E+04	3.845E+01	P 4.676
6		200.0	202.9	1.643E+05	8.267E+01	P 2.651
7		50.00				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:  $Y=aX+b$   
 $r = 0.9993$   
 $Y = 4.064E-001 \cdot X + 2.185E-001$   
 $X = 2.461E+000 \cdot Y - 5.377E-001$   
DL = 9.969E-02 ppb  
BEC = 5.377E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD      Unit  
(2) 66 Zn                72        ppb



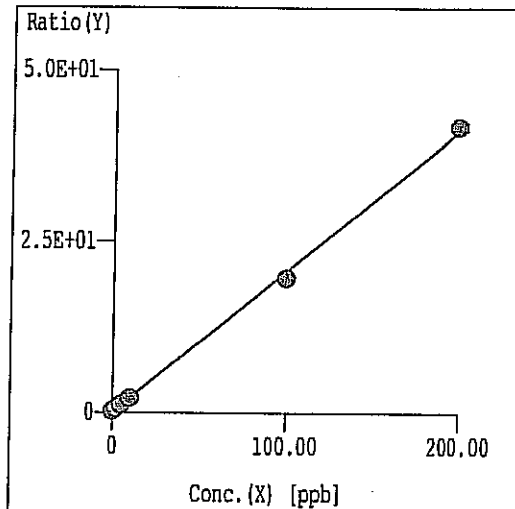
	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	7.952E-01	476.7	6.158E-01	P 1.467
2	ON	2.000		876.7	1.167E+00	P 6.560
3		5.000	5.589	1345	1.813E+00	P 3.820
4		10.00	10.99	2349	3.163E+00	P 2.615
5		100.0	95.38	1.812E+04	2.424E+01	P 1.032
6		200.0	202.2	3.598E+04	5.094E+01	P 1.709
7						
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:  $Y=aX+b$   
 $r = 0.9995$   
 $Y = 2.498E-001 \cdot X + 4.172E-001$   
 $X = 4.003E+000 \cdot Y - 1.670E+000$   
DL = 1.085E-01 ppb  
BEC = 1.670 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 75 As                72     ppb

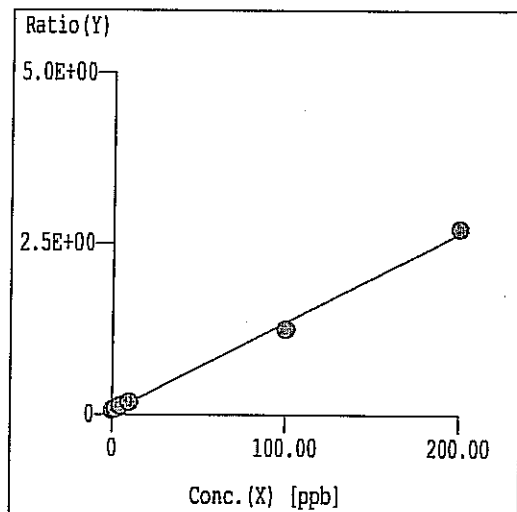


	Rjct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	130.0	1.677E-01	P	18.52
2		2.000	1.990	433.0	5.765E-01	P	7.031
3		5.000	4.862	865.2	1.166E+00	P	1.094
4		10.00	9.499	1574	2.119E+00	P	3.147
5		100.0	94.88	1.470E+04	1.966E+01	P	1.365
6		200.0	202.6	2.952E+04	4.178E+01	P	1.322
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9995$   
 $Y = 2.054E-001 * X + 1.677E-001$   
 $X = 4.868E+000 * Y - 8.163E-001$   
 $DL = 4.534E-01$  ppb  
 $BEC = 8.163E-01$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 82 Se                72     ppb



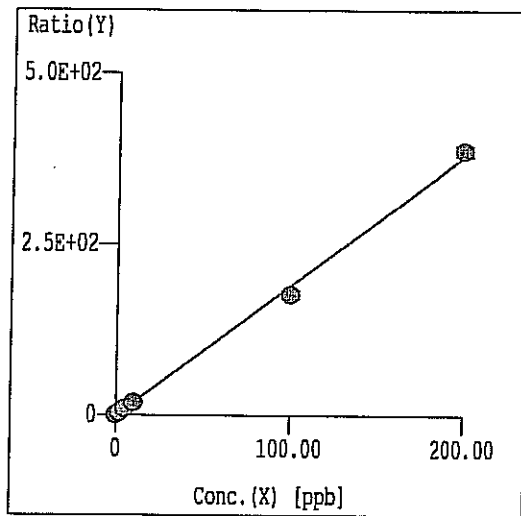
	Rjct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.519	134.1	6.321E-02	P	5.202E-01
2		2.000	2.771	183.3	7.963E-02	P	4.854
3		5.000	6.438	270.7	1.277E-01	P	1.943
4		10.00	10.49	391.5	1.808E-01	P	5.366
5		100.0	91.69	2686	1.245E+00	P	1.283
6		200.0	204.1	5402	2.717E+00	P	1.440
7		50.00					
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17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9986$   
 $Y = 1.310E-002 * X + 4.332E-002$   
 $X = 7.632E+001 * Y - 3.306E+000$   
 $DL = 7.530E-02$  ppb  
 $BEC = 3.306$  ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 88 Sr                72     ppb

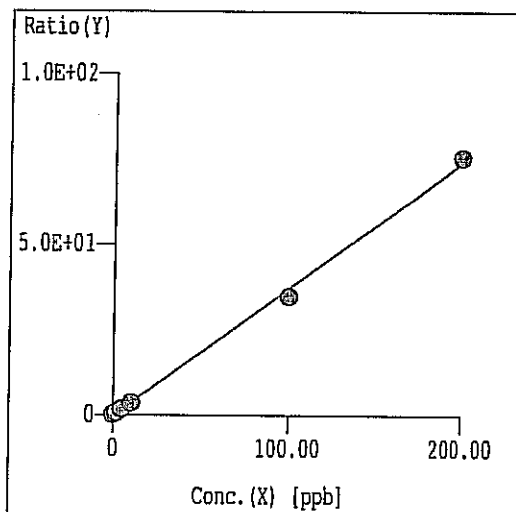


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	351.1	1.656E-01	P	3.478
2		2.000	1.752	8031	3.491E+00	P	2.864
3		5.000	4.836	1.981E+04	9.345E+00	P	2.879
4		10.00	9.497	3.940E+04	1.819E+01	P	4.579
5		100.0	92.67	3.797E+05	1.761E+02	P	3.617
6		200.0	203.7	7.689E+05	3.868E+02	P	2.057
7		50.00					
8							
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17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9991$   
 $Y = 1.898E+000 \cdot X + 1.656E-001$   
 $X = 5.269E-001 \cdot Y - 8.724E-002$   
 $DL = 9.103E-03 \text{ ppb}$   
 $BEC = 8.724E-02 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 95 Mo                72     ppb



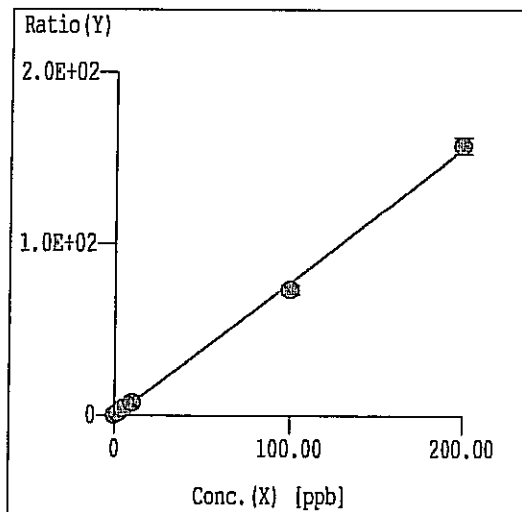
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	245.6	1.159E-01	P	10.59
2		2.000	1.523	1565	6.800E-01	P	2.793
3		5.000	4.500	3778	1.783E+00	P	5.037
4		10.00	9.133	7582	3.500E+00	P	3.091
5		100.0	93.23	7.476E+04	3.466E+01	P	2.631
6		200.0	203.4	1.501E+05	7.549E+01	P	9.365E-01
7		50.00					
8							
9							
10							
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13							
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17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9992$   
 $Y = 3.705E-001 \cdot X + 1.159E-001$   
 $X = 2.699E+000 \cdot Y - 3.127E-001$   
 $DL = 9.938E-02 \text{ ppb}$   
 $BEC = 3.127E-01 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 109 Ag                72     ppb

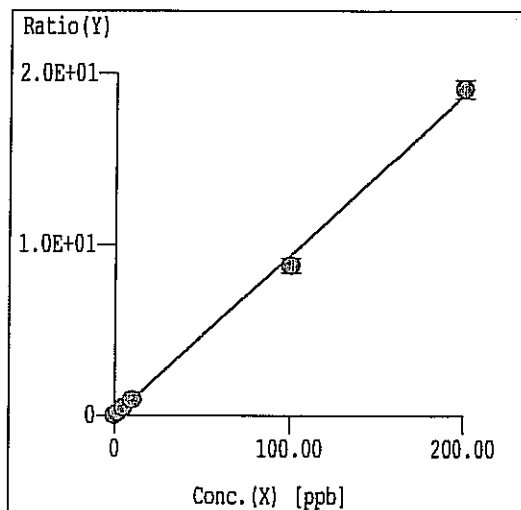


	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	8.452E-01	236.7	1.115E-01	P 13.08
2		2.000	2.600	3405	1.479E+00	P 1.497
3		5.000	5.837	8483	4.002E+00	P 4.890
4		10.00	10.35	1.629E+04	7.523E+00	P 5.206
5		100.0	94.82	1.582E+05	7.336E+01	P 3.687
6		200.0	202.5	3.127E+05	1.573E+02	P 3.085
7		50.00				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:  $Y=aX+b$   
 $r = 0.9995$   
 $Y = 7.794E-001 \cdot X - 5.473E-001$   
 $X = 1.283E+000 \cdot Y + 7.022E-001$   
DL = 5.613E-02 ppb  
BEC = -7.022E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 111 Cd                115    ppb



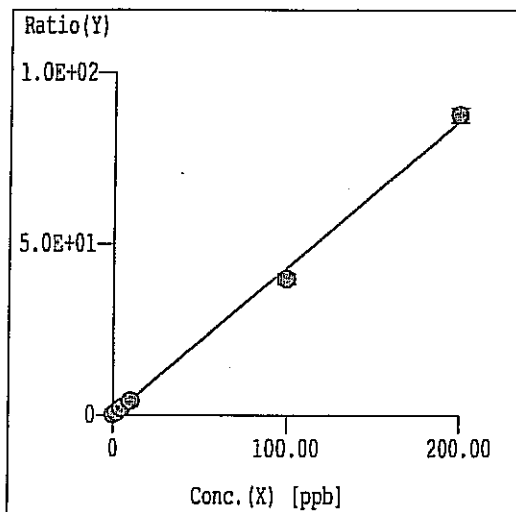
	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	15.93	4.319E-03	P 20.17
2		2.000	1.689	654.8	1.630E-01	P 7.442
3		5.000	4.760	1670	4.514E-01	P 3.352
4		10.00	9.702	3429	9.157E-01	P 3.836
5		100.0	93.40	3.301E+04	8.778E+00	P 4.921
6		200.0	203.3	6.613E+04	1.910E+01	P 2.818
7		50.00				
8						
9						
10						
11						
12						
13						
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15						
16						
17						
18						
19						
20						

Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9993$   
 $Y = 9.393E-002 \cdot X + 4.319E-003$   
 $X = 1.065E+001 \cdot Y - 4.598E-002$   
DL = 2.782E-02 ppb  
BEC = 4.598E-02 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 118 Sn              72      ppb

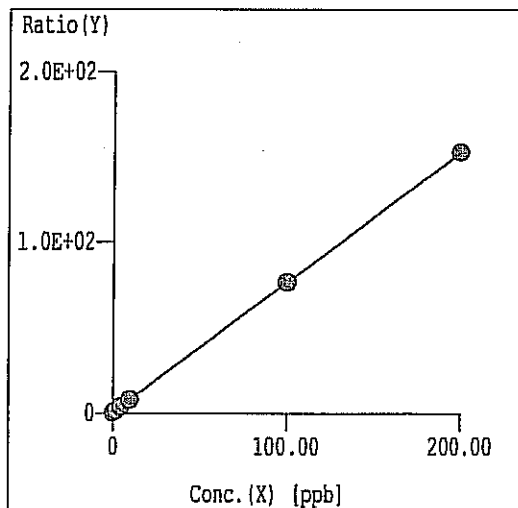


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	173.3	8.183E-02	P	20.18
2		2.000	1.647	1817	7.893E-01	P	6.089
3		5.000	4.711	4464	2.106E+00	P	4.529
4		10.00	9.301	8833	4.079E+00	P	4.657
5		100.0	92.40	8.581E+04	3.979E+01	P	3.836
6		200.0	203.8	1.743E+05	8.768E+01	P	2.489
7		50.00					
8							
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10							
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17							
18							
19							
20							

Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9990$   
 $Y = 4.297E-001 \cdot X + 8.183E-002$   
 $X = 2.327E+000 \cdot Y - 1.904E-001$   
 $DL = 1.153E-01$  ppb  
 $BEC = 1.904E-01$  ppb

Weight: OFF  
 Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 121 Sb              72      ppb



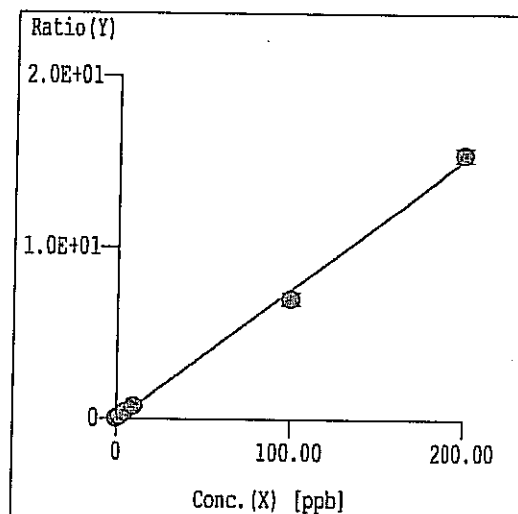
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	277.8	3.590E-01	P	4.507
2		2.000	1.582	1175	1.564E+00	P	5.039
3		5.000	4.657	2897	3.906E+00	P	1.080
4		10.00	9.845	5834	7.857E+00	P	1.258
5		100.0	99.96	5.718E+04	7.648E+01	P	7.296E-01
6		200.0	200.0	1.079E+05	1.527E+02	P	3.585E-01
7		50.00					
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9							
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18							
19							
20							

Curve Fit:  $Y=aX+[blank]$   
 $r = 1.0000$   
 $Y = 7.616E-001 \cdot X + 3.590E-001$   
 $X = 1.313E+000 \cdot Y - 4.714E-001$   
 $DL = 6.374E-02$  ppb  
 $BEC = 4.714E-01$  ppb

Weight: OFF  
 Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 135 Ba            115    ppb

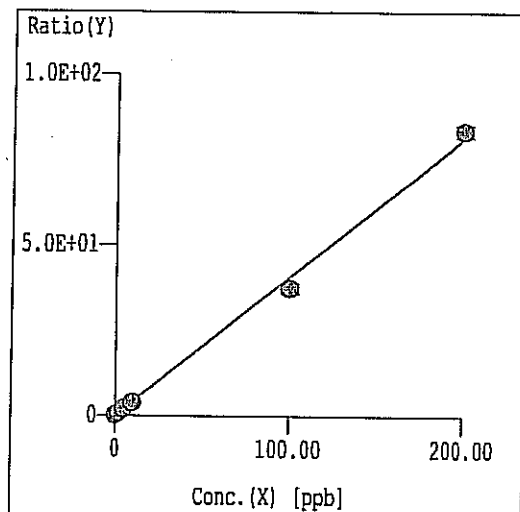


	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	1.134	30.00	8.172E-03	P 40.56
2		2.000	2.958	592.3	1.473E-01	P 6.049
3		5.000	5.880	1370	3.702E-01	P 2.746
4		10.00	10.67	2753	7.353E-01	P 5.740
5		100.0	92.85	2.634E+04	7.006E+00	P 5.197
6		200.0	203.5	5.348E+04	1.545E+01	P 2.585
7		50.00				
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10						
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18						
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20						

Curve Fit:       $Y=aX+b$   
 $r = 0.9990$   
 $Y = 7.629E-002 * X - 7.838E-002$   
 $X = 1.311E+001 * Y + 1.027E+000$   
DL = 1.303E-01 ppb  
BEC = -1.027E+00 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 203 Tl            209    ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	227.8	1.110E-01	P 8.213
2		2.000	1.484	1650	7.161E-01	P 8.096
3		5.000	4.574	4141	1.976E+00	P 2.248
4		10.00	9.076	8083	3.812E+00	P 1.790
5		100.0	91.36	7.837E+04	3.736E+01	P 4.004
6		200.0	204.4	1.577E+05	8.345E+01	P 2.126
7		50.00				
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19						
20						

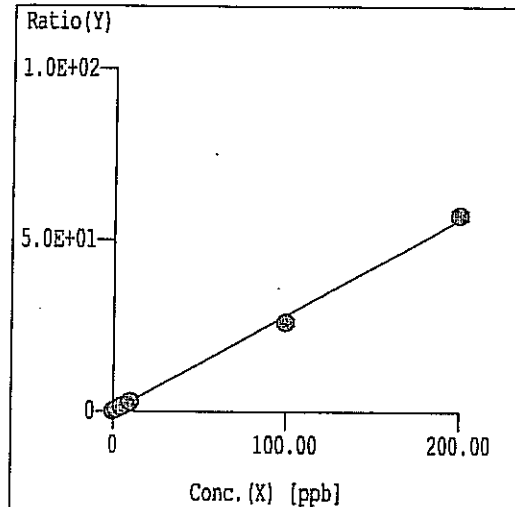
Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9987$   
 $Y = 4.077E-001 * X + 1.110E-001$   
 $X = 2.452E+000 * Y - 2.723E-001$   
DL = 6.709E-02 ppb  
BEC = 2.723E-01 ppb

Weight: OFF  
Min Conc: 0.000



## === Graph Detail ===

Step Mass Element      ISTD    Unit  
 (1) 207 Pb              209    ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	111.1	5.406E-02	P 4.639
2		2.000	1.674	1207	5.241E-01	P 2.564
3		5.000	4.672	2860	1.366E+00	P 4.203
4		10.00	9.615	5834	2.754E+00	P 5.266
5		100.0	92.44	5.456E+04	2.601E+01	P 3.918
6		200.0	203.8	1.082E+05	5.728E+01	P 2.422
7		50.00				
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Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9990$   
 $Y = 2.808E-001 * X + 5.406E-002$   
 $X = 3.561E+000 * Y - 1.925E-001$   
 DL = 2.680E-02 ppb  
 BEC = 1.925E-01 ppb

Weight: OFF  
 Min Conc: 0.000

Last Calib: Feb 28, 2008 03:56 pm  
 Calibration Type: External Calibration Method  
 Calibration Title: ICP\_ORS  
 Weighting Method: 1/(SD\*SD)  
 Mass Interpolation Fit for VIS: Point to Point  
 Method: C:\CPCHEM\1\METHODS\ICP\_LI.M  
 Multi Tune: #1 022708a1.u  
 #2 051107he.u

== Standard Files ==

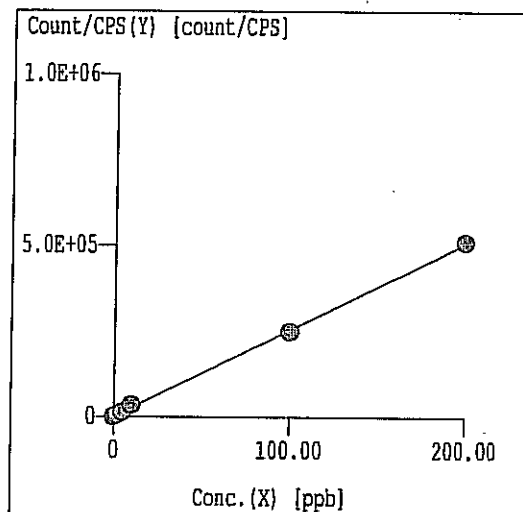
<Data Correction>

Bkg File: ---  
 Rejected Masses: ---  
 Interference Correction: OFF

	Data File	Sample Name	Data Acquired
1	c:\cpcchem\1\data\08b27m00.b\002calb.d	CAL BLK	Feb 27 2008 12:09 pm
2	c:\cpcchem\1\data\08b27m00.b\003cals.d	2/10/200	Feb 27 2008 12:12 pm
3	c:\cpcchem\1\data\08b27m00.b\004cals.d	5/25/500	Feb 27 2008 12:16 pm
4	c:\cpcchem\1\data\08b27m00.b\005cals.d	10/50/1000	Feb 27 2008 12:19 pm
5	c:\cpcchem\1\data\08b27m00.b\006cals.d	100/500/10K	Feb 27 2008 12:22 pm
6	c:\cpcchem\1\data\08b27m00.b\007cals.d	200/1000/20K	Feb 27 2008 12:26 pm
7	---		
8	---		
9	---		
10	---		
11	---		
12	---		
13	---		
14	---		
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16	---		
17	---		
18	---		
19	---		
20	---		

## === Graph Detail ===

Step Mass Element ISTD Unit  
 (1) 7 Li — ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-6.876E-01	117.8		P 7.122
2		2.000	1.407	5415		P 2.586
3		5.000	4.661	1.364E+04		P 1.798
4		10.00	12.84	3.434E+04		P 2.868E-01
5		100.0	97.81	2.492E+05		P 1.395
6		200.0	201.0	5.101E+05		P 5.519E-01
7						
8						
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20						

Curve Fit:  $Y=aX+b$   
 $r = 0.9998$   
 $Y = 2.529E+003 \cdot X + 1.857E+003$   
 $X = 3.954E-004 \cdot Y - 7.342E-001$   
 $DL = 9.951E-03 \text{ ppb}$   
 $BEC = 7.342E-01 \text{ ppb}$

Weight: OFF  
 Min Conc: 0.000

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: MERCURY 080225B

Continuing Calibration Source:

Start: 2/25/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Mercury	5.0	4.94	98.8	5.0	4.87	97.4	4.91	98.2	AV

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802326

Initial Calibration Source:

Run: MERCURY 080225B

Continuing Calibration Source:

Start: 2/25/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Mercury	5.0	4.94	98.8	5.0	4.96	99.2			AV

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802326

Preparation Blank Matrix (soil/water): SOIL

Run: MERCURY 080225B

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
	C		1	C	2	C	3	C	C		
Mercury	0.0		-0.1		-0.1		-0.1		0.000		AV

Note: MDLs are used, not IDLs

FORM III - IN

# CETAC Hg Analysis Report

Analyst: instrument

Worksheet file: C:\Program Files\QuickTrace\Worksheets\022508AS.wsz

Date Started: 2/25/2008 12:52:07 PM

Comment:

ICV STDT# 731-584-60.11  
MS/LCS STDT# 731-584-60.12  
JC. 2/25/08

## Results

Sample Name	Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
Calibration Blank	STD	02/25/08 02:37:19 pm	0.000	61	7.70
Replicates			66.2 62.5 57.4 56.1		
Standard #1	STD	02/25/08 02:39:18 pm	0.200	819	1.10
Replicates			805.8 820.1 823.0 826.2		
Standard #2	STD	02/25/08 02:41:18 pm	1.000	3799	0.69
Replicates			3774.5 3782.8 3805.1 3832.9		
Standard #3	STD	02/25/08 02:43:18 pm	2.000	7621	0.99
Replicates			7537.2 7584.9 7654.9 7708.9		
Standard #4	STD	02/25/08 02:45:20 pm	5.000	18731	0.42
Replicates			18635.1 18707.5 18762.4 18818.2		
Standard #5	STD	02/25/08 02:47:24 pm	10.000	36046	0.66
Replicates			35809.0 35910.0 36119.6 36345.4		

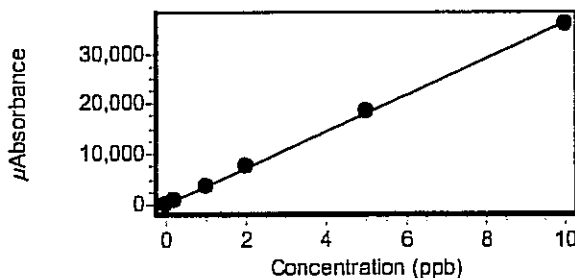
### Calibration

Equation:  $A = 240.998 + 3606.070C$

R2: 0.99963

SEE: 300.1214

Flags:



ICV-584-60-13	ICV	02/25/08 02:52:23 pm	4.940	18040	0.32
Replicates			17956.2 18048.9 18064.2 18090.4		
% Recovery			98.72		

ICB	ICB	02/25/08 02:54:25 pm	-0.048	69	23.75
Replicates			87.3 73.7 65.2 48.4		

Sample Name					Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
CRA-584-60-11					CRDL	02/25/08 02:56:26 pm	0.158	810	0.77
Replicates	801.6	810.8	816.6	811.5					
% Recovery	78.91								
GBLKS1-022508					MB	02/25/08 02:58:24 pm	-0.041	92	4.42
Replicates	96.8	90.8	92.0	87.0					
GLCSS1-022508-584-60-12					LCS	02/25/08 03:00:26 pm	5.210	19047	0.55
Replicates	18914.4	19015.4	19099.5	19156.9					
% Recovery	104.30								
GLCSDS1-022508-584-60-12					LCS	02/25/08 03:02:28 pm	5.170	18879	0.56
Replicates	18737.8	18857.1	18951.0	18968.4					
% Recovery	103.37								
0802300-01C					UNK	02/25/08 03:12:09 pm	0.142	752	0.40
Replicates	748.3	753.5	752.2	755.5					
0802300-01CDUP					DUP	02/25/08 03:14:09 pm	0.143	756	0.80
Replicates	748.1	761.4	760.5	755.7					
	RPD 0.00								
0802300-01CMS-584-60-12					MSK	02/25/08 03:16:10 pm	4.990	18223	0.62
Replicates	18072.7	18201.7	18308.4	18309.3					
% Recovery	96.87								
0802300-01CMSD-584-60-12					MSDUP	02/25/08 03:18:14 pm	5.060	18479	0.25
Replicates	18410.6	18487.0	18506.7	18511.2					
% Recovery	98.29	RPD 1.41							
CCV-584-60-13					CCV	02/25/08 03:20:16 pm	4.830	17656	1.05
Replicates	17451.8	17562.3	17744.5	17866.4					
% Recovery	96.59								
CCB					CCB	02/25/08 03:22:19 pm	-0.058	32	16.32
Replicates	39.6	31.5	29.9	27.5					
0802300-02D					UNK	02/25/08 03:29:21 pm	-0.022	161	1.78
Replicates	159.2	157.5	163.9	162.1					
0802300-03C					UNK	02/25/08 03:31:21 pm	-0.035	115	2.04
Replicates	112.1	116.4	116.1	117.4					



Sample Name					Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
0802300-04C					UNK	02/25/08 03:33:20 pm	0.080	529	0.45
Replicates	528.2	526.1	529.8	531.7					
0802300-05D					UNK	02/25/08 03:35:20 pm	-0.039	99	2.25
Replicates	97.6	97.9	98.3	102.3					
0802300-06C					UNK	02/25/08 03:37:21 pm	-0.034	118	3.59
Replicates	111.9	121.6	117.9	120.1					
0802300-07D					UNK	02/25/08 03:39:21 pm	-0.025	150	2.97
Replicates	143.9	151.7	154.3	151.6					
0802300-08D					UNK	02/25/08 03:41:23 pm	-0.025	150	3.00
Replicates	144.9	147.9	152.4	155.0					
0802304-01D					UNK	02/25/08 03:43:24 pm	-0.015	188	3.14
Replicates	183.7	191.1	195.1	182.8					
0802304-02D					UNK	02/25/08 03:45:26 pm	0.003	253	1.51
Replicates	247.5	253.8	256.7	252.6					
0802304-03D					UNK	02/25/08 03:47:29 pm	0.014	291	2.49
Replicates	280.1	295.5	292.3	295.1					
CCV-584-60-13					CCV	02/25/08 03:49:31 pm	4.880	17850	0.76
Replicates	17656.9	17852.2	17935.0	17956.0					
% Recovery	97.66								
CCB					CCB	02/25/08 03:53:52 pm	-0.058	33	18.54
Replicates	38.6	27.7	27.3	37.3					
0802318-01C					UNK	02/25/08 03:55:51 pm	0.151	785	0.46
Replicates	781.0	782.9	786.5	789.2					
0802318-02D					UNK	02/25/08 03:57:50 pm	-0.032	124	3.00
Replicates	129.5	123.0	121.5	122.0					

Sample Name					Type	Date/Time	Conc (ppb)	μAbs	%RSD
0802318-03C					UNK	02/25/08 03:59:51 pm	-0.002	232	1.29
Replicates	234.2	234.8	231.5	228.2					
0802318-04C					UNK	02/25/08 04:01:50 pm	-0.015	188	2.01
Replicates	189.0	191.5	183.0	190.4					
CCV-584-60-13					CCV	02/25/08 04:03:52 pm	4.870	17809	0.60
Replicates	17702.2	17753.5	17833.8	17948.2					
% Recovery	97.44								
CCB					CCB	02/25/08 04:05:56 pm	-0.060	23	26.59
Replicates	31.5	20.0	17.7	21.9					
GBLKS2-022508					MB	02/25/08 04:13:57 pm	-0.052	55	10.57
Replicates	48.3	52.7	54.8	62.1					
GLCSS2-022508-584-60-12					LCS	02/25/08 04:15:58 pm	5.120	18707	0.58
Replicates	18550.5	18719.3	18791.5	18768.6					
% Recovery	102.42								
GLCSDS2-022508-584-60-12					LCS	02/25/08 04:18:04 pm	5.240	19127	0.25
Replicates	19063.9	19124.4	19144.6	19176.9					
% Recovery	104.75								
0802326-06C					UNK	02/25/08 04:20:07 pm	-0.047	73	7.40
Replicates	77.3	74.0	75.7	65.2					
0802326-06CDUP					DUP	02/25/08 04:22:11 pm	-0.049	66	5.61
Replicates	67.9	64.9	69.1	60.8					
	RPD 0.00								
0802326-06CMS-584-60-12					MSK	02/25/08 04:24:13 pm	4.690	17147	0.17
Replicates	17104.8	17163.7	17165.8	17154.7					
% Recovery	94.74								
0802326-06CMSD-584-60-12					MSDUP	02/25/08 04:26:15 pm	4.800	17548	0.48
Replicates	17440.4	17529.4	17587.3	17636.7					
% Recovery	96.96	RPD 2.35							
0802326-01B					UNK	02/25/08 04:28:17 pm	0.118	667	0.45
Replicates	667.8	663.1	669.6	669.3					

Sample Name				Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
0802326-02B				UNK	02/25/08 04:30:19 pm	-0.015	187	2.57
Replicates	183.3	185.8	184.5	193.9				
0802326-03C				UNK	02/25/08 04:32:19 pm	-0.034	119	0.96
Replicates	117.7	118.7	119.7	120.2				
CCV-584-60-13				CCV	02/25/08 04:34:20 pm	4.910	17960	0.73
Replicates	17807.5	17901.0	18030.0	18101.9				
% Recovery	98.27							
CCB				CCB	02/25/08 04:36:25 pm	-0.056	39	12.33
Replicates	43.6	35.4	34.3	42.7				
0802326-04C				UNK	02/25/08 04:38:27 pm	0.011	281	2.11
Replicates	282.9	288.1	275.8	276.1				
0802326-05C				UNK	02/25/08 04:40:30 pm	0.054	436	0.88
Replicates	434.1	436.1	432.7	441.4				
0802326-07C				UNK	02/25/08 04:42:32 pm	0.033	360	0.81
Replicates	360.8	362.9	358.3	356.2				
0802326-08B				UNK	02/25/08 04:44:34 pm	0.030	348	0.67
Replicates	346.2	351.4	346.7	348.4				
0802326-09B				UNK	02/25/08 04:46:37 pm	-0.035	117	1.96
Replicates	118.4	115.3	118.5	113.9				
0802326-10C				UNK	02/25/08 04:48:41 pm	-0.036	110	3.47
Replicates	112.3	112.4	110.3	104.3				
CCV-584-60-13				CCV	02/25/08 04:50:42 pm	4.960	18111	0.23
Replicates	18050.6	18134.2	18139.1	18118.3				
% Recovery	99.11							
CCB				CCB	02/25/08 04:52:46 pm	-0.065	6	43.53
Replicates	5.1	8.1	7.0	2.5				

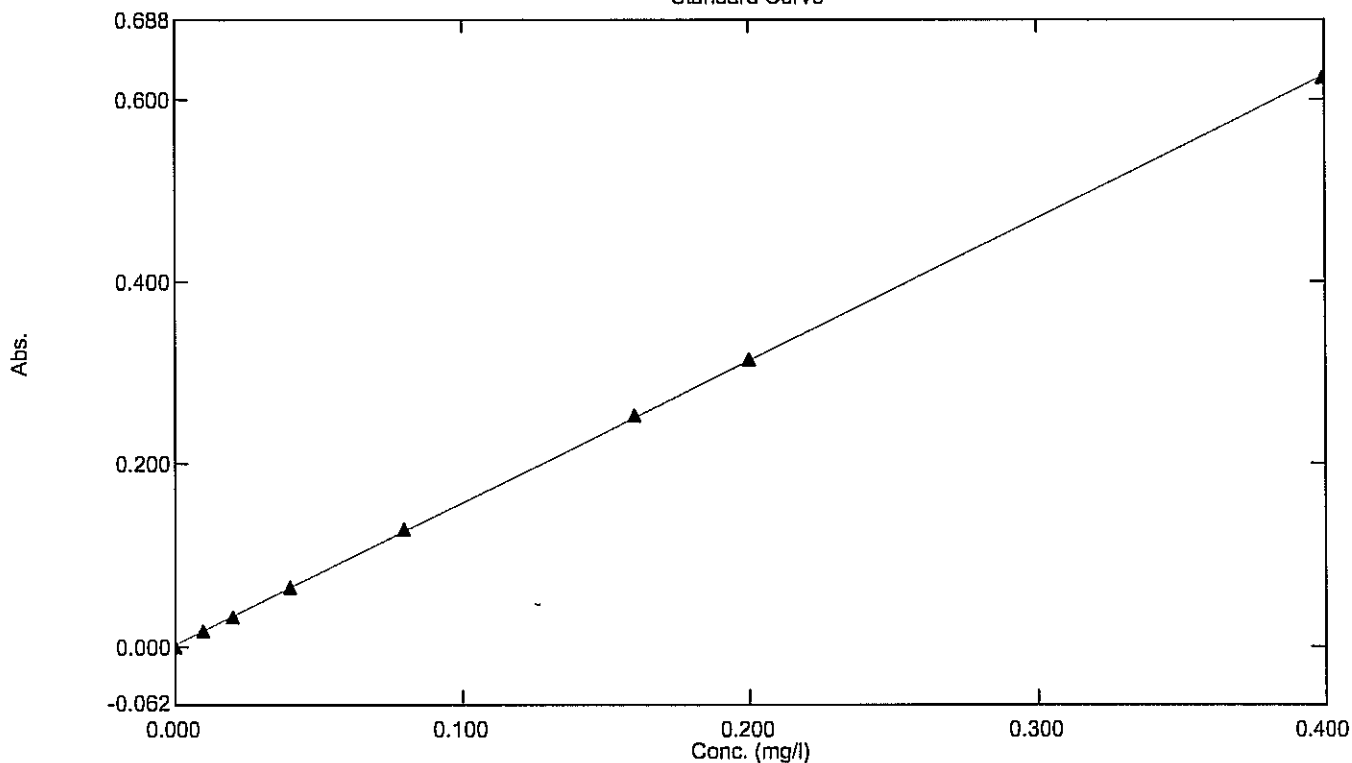
# Standard Table Report

02/28/2008 04:03:22 PM

File Name: C:\Program

Files\Shimadzu\UVProbe\Data\CALIBRATION\Cyanide\120707\_CN\_TW\_TS\_CAL.p

Standard Curve



Standard Table

	Sample ID	Type	Ex	Conc	WL578.0	Wgt.Factor	Comments
1	STD1	Standard		0.000	0.000	1.000	
2	STD2	Standard		0.010	0.016	1.000	
3	STD3	Standard		0.020	0.032	1.000	
4	STD4	Standard		0.040	0.065	1.000	
5	STD5	Standard		0.080	0.128	1.000	
6	STD6	Standard		0.160	0.253	1.000	
7	STD7	Standard		0.200	0.316	1.000	
8	STD8	Standard		0.400	0.625	1.000	
9							

[illegible]

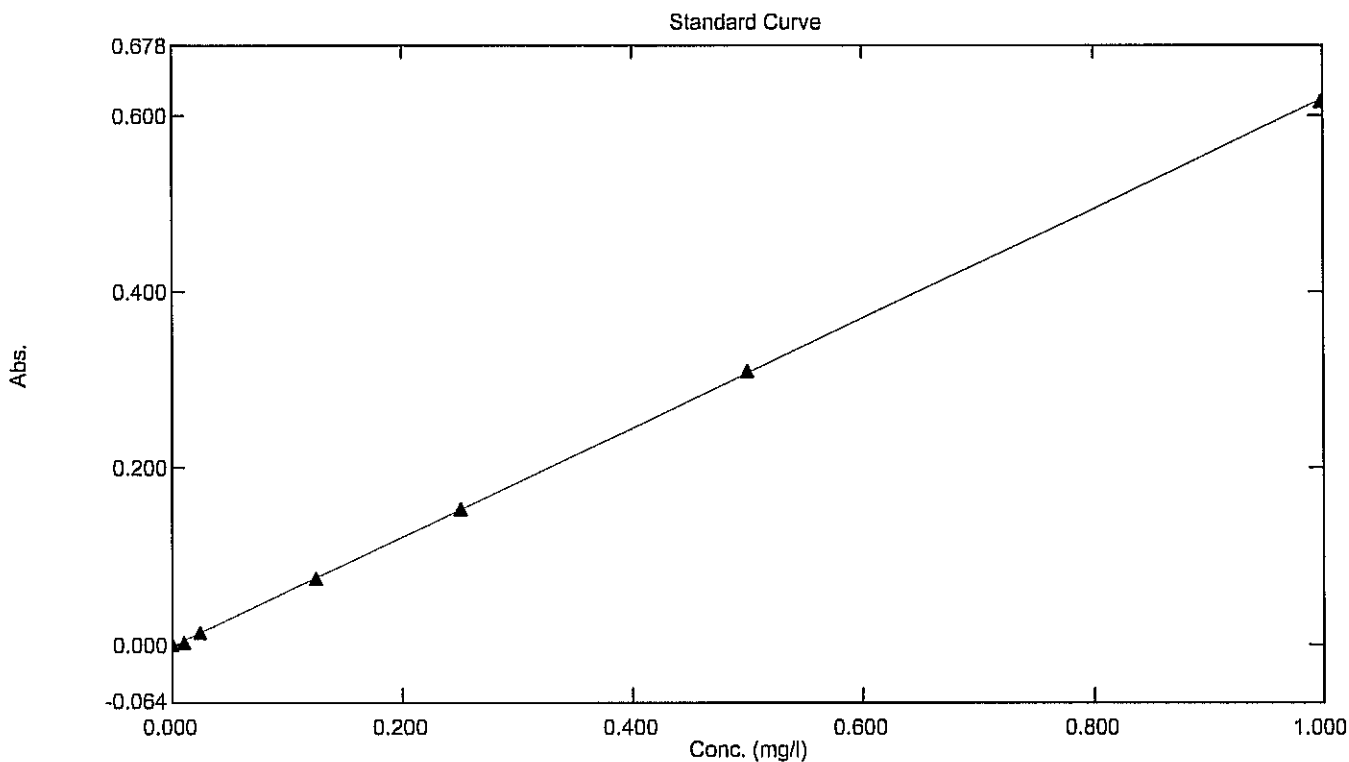
Page 96 of 100

# Standard Table Report

02/28/2008 09:04:01 AM

File Name: C:\Program

Files\Shimadzu\UVProbe\Data\CALIBRATION\PO4\TP-OPO4-CAL-052207.pho



Multiple Correlation Coefficient  $r^2 = 0.99995$

Standard Table

	Sample ID	Type	Ex	Conc	WL880.0	Wgt.Factor	Comments
1	STD1	Standard		0.000	-0.001	1.000	
2	STD2	Standard		0.010	0.002	1.000	
3	STD3	Standard		0.025	0.013	1.000	
4	STD4	Standard		0.125	0.074	1.000	
5	STD5	Standard		0.250	0.154	1.000	
6	STD6	Standard		0.500	0.309	1.000	
7	STD7	Standard		1.000	0.616	1.000	
8							

Method: P-TS		SOP #:		Date/Time: 02/26/08 930		Analyst: D.M.				
WO # / SX #	Init Sample Vol (mL) or Wt (grams)	Prep Final Volume (mL)	Anal Dil Factor	Total Dil Factor	Background (A)		Corrected Conc. - mg/L (B-A)	Comments / Batch ID		
				Conc. mg/L						
				Abs.		Colored Sample (B)				
						Conc. mg/L				
						Abs				
						Corr. Abs (B-A)				
W1BUCW1	1 pr	50 mL		50X			-0.000	0.003	0.15	R-60267
W1CUCW1	1						0.158	0.258	12.9	
W1CUCW1							0.152	0.248	12.4	
0802325-01B			10X	500X			0.171	0.280	140	
-02B							0.244	0.397	19.85	
-03C							0.346	0.563	28.15	
-04C			5X	250X			0.260	0.423	105.75	
-05C			5X	250X			0.175	0.285	71.25	
-06C							0.170	0.277	13.85	
-07C			5X	250X			0.287	0.467	116.75	
-08B			5X	250X			0.150	0.245	61.25	
-09B							0.215	0.351	17.55	
-10C			5X	250X			0.302	0.491	122.75	
0802325-01C							0.299	0.486	121.50	
0802325-01D							0.288	0.469	117.25	
CCW	50 mL						0.313	0.509		
CCB							0.002	0.006		
of MC failed due to matrix interference										
D.M. 02/26/08										
Reviewed By: 27										
2/26/08										

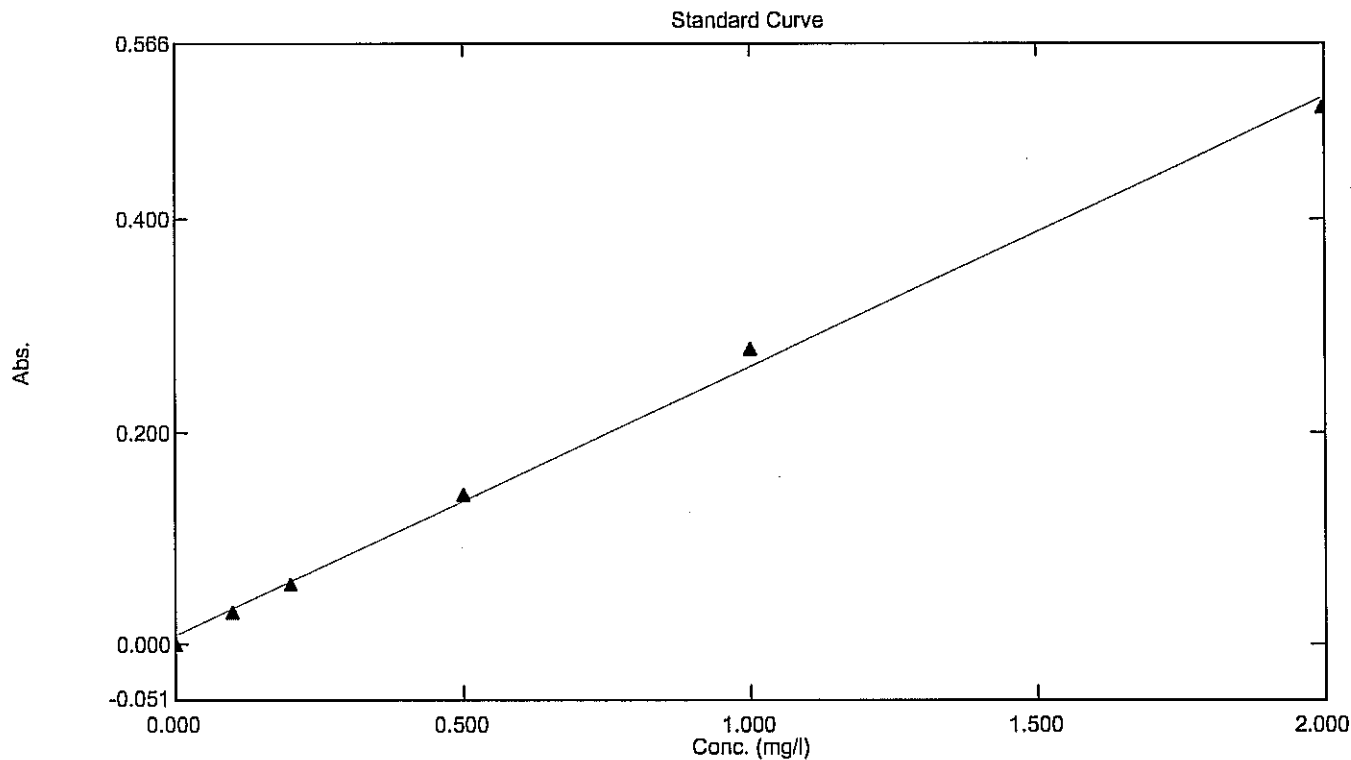


# Standard Table Report

02/29/2008 11:58:13 AM

File Name: C:\Program

Files\Shimadzu\UVProbe\Data\CALIBRATION\SIO2\022608-SiO2-cal.pho



Multiple Correlation Coefficient  $r^2 = 0.99735$

Standard Table

	Sample ID	Type	Ex	Conc	WL815.0	Wgt.Factor	Comments
1	std1	Standard		0.000	0.000	1.000	
2	std2	Standard		0.100	0.029	1.000	
3	std3	Standard		0.200	0.056	1.000	
4	std4	Standard		0.500	0.141	1.000	
5	std5	Standard		1.000	0.278	1.000	
6	std6	Standard		2.000	0.506	1.000	
7							



Analyst: TL	Date/Time In: 2/19/2008 3:30PM		Temp In Deg C:		105			
Review By: RPM	Date/Time Out: 2/20/2008 12:00pm		Temp Out Deg C:		105			
Method: % Moisture	Batch ID: R60094							
SOP: WC-014 Rev 4								
WO #	Sample Type	Dish	Pan Wt	Wet Wt	1st Wt	2nd Wt	% Moisture	Analyte
0802326-01B	SAMP	31	1.2909	7.4732	8.5126	8.5161	3.32	Percent Moisture
0802326-01BDUP	DUP	32	1.2892	7.4764	8.5079	8.5101	3.42	Percent Moisture
0802326-02B	SAMP	33	1.2847	5.8951	6.837	6.8394	5.77	Percent Moisture
0802326-03C	SAMP	34	1.2951	5.6791	6.7191	6.7211	4.46	Percent Moisture
0802326-04C	SAMP	35	1.2956	6.9392	8.0985	8.1014	1.92	Percent Moisture
0802326-05C	SAMP	36	1.2897	7.5001	8.5831	8.5867	2.74	Percent Moisture
0802326-06C	SAMP	37	1.2662	7.0711	8.1332	8.1361	2.85	Percent Moisture
0802326-07C	SAMP	38	1.2945	5.6711	6.8266	6.8291	2.41	Percent Moisture
0802326-08B	SAMP	39	1.3007	8.2567	9.3726	9.3744	2.22	Percent Moisture
0802326-09B	SAMP	40	1.2859	6.7228	7.6089	7.6104	5.92	Percent Moisture
0802326-10C	SAMP	41	1.2702	7.9556	8.1527	8.1558	13.45	Percent Moisture
0802353-01C	SAMP	42	1.3235	6.9456	6.9576	6.9604	18.84	Percent Moisture
0802353-02A	SAMP	43	1.2936	6.1351	5.9819	5.9834	23.61	Percent Moisture
0802353-03A	SAMP	44	1.2746	6.5989	6.0487	6.0512	27.62	Percent Moisture
0802353-04A	SAMP	45	1.2769	7.9501	7.4726	7.4754	22.03	Percent Moisture
0802353-05A	SAMP	46	1.2983	7.3556	6.8922	6.8951	23.91	Percent Moisture
0802353-06B	SAMP	47	1.2805	6.1294	6.0614	6.0617	22.00	Percent Moisture
0802353-07A	SAMP	48	1.2979	6.8458	6.3952	6.3983	25.50	Percent Moisture
0802353-08A	SAMP	49	1.2756	6.5606	6.263	6.2678	23.91	Percent Moisture
0802353-09A	SAMP	50	1.2786	8.3291	6.9905	6.9948	31.37	Percent Moisture
0802353-09ADUP	DUP	51	1.2877	8.8864	7.0566	7.0581	31.19	Percent Moisture
0802368-04B	SAMP	52	1.2883	11.0341	6.8921	6.8891	49.24	Percent Moisture
							#DIV/0!	Percent Moisture
			1.2881	7.22414091	7.28927273	7.2916318	16.90	Percent Moisture



Page 1 of 1

Customer Information				Project Information				Project Manager:				Parameter/Method Request for Analysis				Work Order # 802326							
Purchase Order	Project Name	Project Number	Bill To Company	Invoice Attn	City/State/Zip	Phone	Fax	e-Mail Address	Time	Matrix	Pres.	# Bottles	A	B	C	D	E	F	G	H	I	J	Hold
Work Order	Oro Grande LP-Rinse	5285-027	Malcolm Pirnie, Inc.	Michael Fortenza	1700 West Loop South Suite 1450	Houston, TX 77027	(713) 840-1511	(713) 840-1207		Soil		1 Kit	X		X				X		X		X
Company Name	Michael Fortenza	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	Soil		1 Kit	X		X			X		X		X	
Send Report To	1700 West Loop South Suite 1450	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	Soil		1 Kit	X		X			X		X		X	
Address	Houston, TX 77027	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	Soil		1 Kit	X		X			X		X		X	
City/State/Zip	(713) 840-1511	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	Soil		1 Kit	X		X			X		X		X	
Phone	(713) 840-1207	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	Soil		1 Kit	X		X			X		X		X	
Fax		2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	Soil		1 Kit	X		X			X		X		X	
e-Mail Address		2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	Soil		1 Kit	X		X			X		X		X	
		2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	Soil		1 Kit	X		X			X		X		X	
		2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	Soil		1 Kit	X		X			X		X		X	
		2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	Soil		1 Kit	X		X			X		X		X	
		2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	Soil		1 Kit	X		X			X		X		X	
		2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	Soil		1 Kit	X		X			X		X		X	
		2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	Soil		1 Kit	X		X			X		X		X	
		2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	Soil		1 Kit	X		X			X		X		X	
		2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	Soil		1 Kit	X		X			X		X		X	
		2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	Soil		1 Kit	X		X			X		X		X	
		2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	2/14/08	Soil		1 Kit	X		X			X		X		X	
		2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	2/15/08	Soil		1 Kit	X		X			X		X			

**Note:** 1. Any changes must be made in writing once samples and COC Form have been submitted to e-Lab Analytical, Inc.

1. Any changes must be made in writing once samples and COC Form have been submitted to e-Lab Analytical, Inc.

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Sample Receipt Checklist

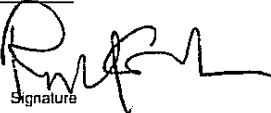
Client Name: MALCOLM PIRNIE

Date/Time Received: 2/18/2008 7:30:00 AM

Work Order Number 0802326

Received by: RSZ

Checklist completed by

  
Signature

2/18/08  
Date

Reviewed by

  
Initials

2/18/08  
Date

Matrix:

Carrier name: FedEx

Shipping container/cooler in good condition?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	Not Present <input type="checkbox"/>
Custody seals intact on shipping container/cooler?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	Not Present <input type="checkbox"/>
Custody seals intact on sample bottles?	Yes <input type="checkbox"/>	No <input type="checkbox"/>	Not Present <input type="checkbox"/>
Chain of custody present?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Chain of custody signed when relinquished and received?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Chain of custody agrees with sample labels?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Samples in proper container/bottle?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Sample containers intact?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Sufficient sample volume for indicated test?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
All samples received within holding time?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Container/Temp Blank temperature in compliance?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Temperature(s)/Thermometer(s):	<u>3.1c, 2.8c</u>	<u>002</u>	
Cooler(s)/Kit(s):	<u>2330, 1598</u>		
Water - VOA vials have zero headspace?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	No VOA vials submitted <input type="checkbox"/>
Water - pH acceptable upon receipt?	Yes <input type="checkbox"/>	No <input type="checkbox"/>	N/A <input checked="" type="checkbox"/>

Adjusted?

Checked by

Login Notes:

Client contacted:

Date contacted:

Person contacted

Contacted by:

Regarding:

Comments:

Corrective Action

2/16/08  
 FedEx Tracking Number 8641706517107330  
 Sender's Name Colin Nelson Phone 281 530 5887  
 Company Malcolm Pirnie  
 Address 1700 West Loop South #1450  
 City Houston State TX ZIP 77027  
 Our Internal Billing Reference

W.O.# 0802326

2/16/08  
 FedEx Tracking Number 8641706517312070  
 Sender's Name Colin Nelson Phone 281 530 5887  
 Company Malcolm Pirnie  
 Address 1700 West Loop South #1450  
 City Houston State TX ZIP 77027  
 Our Internal Billing Reference

2/16/08  
 FedEx Tracking Number 8641706518451598  
 Sender's Name Colin Nelson Phone 281 530 5887  
 Company Malcolm Pirnie  
 Address 1700 West Loop South #1450  
 City Houston State TX ZIP 77027  
 Our Internal Billing Reference

**ALS e-Lab Analytical**  
 10450 Stancliff Rd., Suite 210  
 Houston, Texas 77099  
 Tel. 281.530.5656  
 Fax. 218.530.5887

Date: 2/16/08  
 Name: Colin Nelson  
 Company: Malcolm Pirnie

**CUSTODY SEAL**  
 Date: 2/16/08 Time: 4:16  
 Name: Colin Nelson  
 Company: Malcolm Pirnie

Seal Broken By: 2/16/08

**ALS e-Lab Analytical**  
 10450 Stancliff Rd., Suite 210  
 Houston, Texas 77099  
 Tel. 281.530.5656  
 Fax. 218.530.5887

Date: 2/16/08  
 Name: Colin Nelson  
 Company: Malcolm Pirnie

**CUSTODY SEAL**  
 Date: 2/16/08 Time: 4:16  
 Name: Colin Nelson  
 Company: Malcolm Pirnie

Seal Broken By: 2/16/08

**ALS e-Lab Analytical**  
 10450 Stancliff Rd., Suite 210  
 Houston, Texas 77099  
 Tel. 281.530.5656  
 Fax. 218.530.5887

Date: 2/16/08  
 Name: Colin Nelson  
 Company: Malcolm Pirnie

**CUSTODY SEAL**  
 Date: 2/16/08  
 Name: Colin Nelson  
 Company: Malcolm Pirnie

Seal Broken By: 2/16/08

## Ed Fry

---

**From:** Melson, Colin [CMelson@PIRNIE.COM]  
**Sent:** Monday, February 18, 2008 11:09 AM  
**To:** Ed Fry  
**Subject:** FB-14

Ed,

Just a reminder. Several of the samples you recieved this morning were marked "hold". Those samples need to be taken off "hold" and analyzed for the analysis' marked on the chain of custody.

### **Colin Melson**

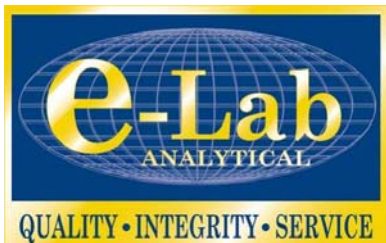
Project Environmental Scientist

**Malcolm Pirnie, Inc.**  
1700 West Loop South, Suite 1450  
Houston, Texas 77027  
Direct: 713-960-7446  
Cell: 713-303-9316  
Fax: 713-840-1207



Please consider the environment before printing this e-mail

\*\*\*\*\*  
This e-mail has been swept by mimesweeper  
through the ALS North America gateway.  
\*\*\*\*\*



February 28, 2008

Michael Forlenza  
Malcolm Pirnie, Inc.  
1700 West Loop South  
Suite 1450  
Houston, TX 77027

Tel: (713) 840-1511  
Fax: (713) 840-1207

Re: Oro Grande LF- Deep Borings

Work Order : **0802318**

Dear Michael Forlenza,

e-Lab Analytical, Inc. received 5 samples on 2/15/2008 09:15 AM for the analyses presented in the following report.

The analytical data provided relates directly to the samples received by e-Lab Analytical, Inc. and for only the analyses requested. Results are expressed as "as received" unless otherwise noted.

QC sample results for this data met EPA or laboratory specifications except as noted in the Case Narrative or as noted with qualifiers in the QC batch information. Should this laboratory report need to be reproduced, it should be reproduced in full unless written approval has been obtained by e-Lab Analytical, Inc. Samples will be disposed in 30 days unless storage arrangements are made.

The total number of pages in this report is 205.

If you have any questions regarding this report, please feel free to call me.

Sincerely,

Electronically approved by: Glenda H. Ramos

Ed B. Fry  
Project Manager



Certificate No: T104704231-06-TX

**e.Lab Analytical, Inc.**  
Part of the **ALS Laboratory Group**  
10450 Stancliff Rd, Suite 210 Houston, Texas 77099-4338  
Phone: (281) 530-5656 Fax: (281) 530-5887  
[www.elabi.com](http://www.elabi.com) [www.alsglobal.com](http://www.alsglobal.com)  
*A Campbell Brothers Limited Company*



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**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Deep Borings  
**Work Order:** 0802318

**Work Order Sample Summary**

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<u>Lab Samp ID</u>	<u>Client Sample ID</u>	<u>Matrix</u>	<u>Tag Number</u>	<u>Collection Date</u>	<u>Date Received</u>	<u>Hold</u>
0802318-01	F14-SB-6 (0-2)	Soil		2/12/2008 16:10	2/15/2008 09:15	<input type="checkbox"/>
0802318-02	F14-SB-6 (13-15)	Soil		2/12/2008 16:23	2/15/2008 09:15	<input type="checkbox"/>
0802318-03	F14-SB-6 (28-30)	Soil		2/12/2008 16:46	2/15/2008 09:15	<input type="checkbox"/>
0802318-04	F14-SB-6 (113-115)	Soil		2/12/2008 12:30	2/15/2008 09:15	<input type="checkbox"/>
0802318-05	Trip Blank	Water		2/13/2008 12:30	2/15/2008 09:15	<input type="checkbox"/>

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Deep Borings  
**Work Order:** 0802318

**Case Narrative**

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Batch 28371, Herbicides, MS/MSD are "P" qualified for MCPP due to coelution on the confirming column. Results are reported from the non-coeluting column.

Batch 28320, Metals, Sample 0802326-06 , F14-SB-2 (13-15) : MS/MSD recoveries were outside control limits for some compounds. MS/MSD RPDs were outside control limits for Barium and Strontium. The duplicate RPD was outside control limits for Barium. Results are flagged with "E" and "O" qualifiers as applicable.

Batch 28295, Semivolatile Organics, Sample 0802300-03 , F14-SB-1 (28-30) MS/MSD RPD was outside control limits for Pentachlorophenol. Individual recoveries were within control limits.

Batch R60110, Phosphorus, Sample 0802300-01, F14-SB-1 (0-2) : MS recovery was above control limits for Total Phosphorus.

Batch R60293, Silica, Sample 0802300-01, F14-SB-1 (0-2) : MS recovery was below control limits for Dissolved Silica.

## e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF- Deep Borings  
 Sample ID: F14-SB-6 (0-2)  
 Collection Date: 2/12/2008 4:10:00 PM

Work Order: 0802318  
 Lab ID: 0802318-01  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	116			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	113			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	U		0.50	1.7	mg/Kg	1	2/22/2008
Surr: 2-Fluorobiphenyl	78.2			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	10.0	J	1.4	13.2	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/20/08		Analyst: <b>SA</b>
Aluminum	4,230		33	89.3	mg/Kg	100	2/21/2008
Antimony	U		0.12	0.446	mg/Kg	1	2/20/2008
Arsenic	2.41		0.12	0.446	mg/Kg	1	2/20/2008
Barium	69.8		0.062	0.446	mg/Kg	1	2/20/2008
Beryllium	0.298	J	0.027	0.446	mg/Kg	1	2/20/2008
Boron	1.98	J	0.36	2.23	mg/Kg	1	2/20/2008
Cadmium	0.0591	J	0.027	0.446	mg/Kg	1	2/20/2008
Calcium	26,100		890	4,460	mg/Kg	100	2/21/2008
Chromium	4.37		0.062	0.446	mg/Kg	1	2/20/2008
Cobalt	2.29		0.015	0.446	mg/Kg	1	2/20/2008
Copper	3.52		0.036	0.446	mg/Kg	1	2/20/2008
Iron	4,840		3.9	44.6	mg/Kg	1	2/20/2008
Lead	4.79		0.080	0.446	mg/Kg	1	2/20/2008
Magnesium	1,610		2.3	44.6	mg/Kg	1	2/20/2008
Manganese	100		0.045	0.446	mg/Kg	1	2/20/2008
Molybdenum	0.133	J	0.089	0.446	mg/Kg	1	2/20/2008
Nickel	3.82		0.071	0.446	mg/Kg	1	2/20/2008
Potassium	1,110		2.3	44.6	mg/Kg	1	2/20/2008
Selenium	0.493		0.17	0.446	mg/Kg	1	2/20/2008
Silver	0.107	J	0.018	0.446	mg/Kg	1	2/20/2008
Sodium	U		8.1	44.6	mg/Kg	1	2/20/2008
Strontium	49.7		0.089	0.446	mg/Kg	1	2/20/2008

Qualifiers: U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

AR Page 1 of 19

# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Deep Borings  
**Sample ID:** F14-SB-6 (0-2)  
**Collection Date:** 2/12/2008 4:10:00 PM

**Work Order:** 0802318  
**Lab ID:** 0802318-01  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	0.0537	J	0.045	0.446	mg/Kg	1	2/20/2008
Tin	0.955	J	0.36	2.23	mg/Kg	1	2/20/2008
Titanium	104		0.062	0.446	mg/Kg	1	2/20/2008
Vanadium	10.3		0.050	0.446	mg/Kg	1	2/20/2008
Zinc	12.8		0.089	0.446	mg/Kg	1	2/20/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>
Lithium	U		4.8	4.76	mg/Kg	1	2/27/2008
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>		Analyst: <b>RKG</b>		
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/25/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/25/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/25/2008
Acetone	U		2.0	25	µg/Kg	1	2/25/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
Bromoform	U		0.50	10	µg/Kg	1	2/25/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/25/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/25/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/25/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/25/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/25/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/25/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/25/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/25/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Deep Borings  
**Sample ID:** F14-SB-6 (0-2)  
**Collection Date:** 2/12/2008 4:10:00 PM

**Work Order:** 0802318  
**Lab ID:** 0802318-01  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
<b>Dichloromethane</b>	<b>5.9</b>	<b>J</b>	<b>3.0</b>	<b>10</b>	<b>µg/Kg</b>	<b>1</b>	<b>2/25/2008</b>
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/25/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/25/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/25/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/25/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/25/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/25/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/25/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/25/2008
Surr: 1,2-Dichloroethane-d4	95.7			70-128	%REC	1	2/25/2008
Surr: 4-Bromofluorobenzene	96.3			73-126	%REC	1	2/25/2008
Surr: Dibromofluoromethane	97.0			71-128	%REC	1	2/25/2008
Surr: Toluene-d8	96.9			73-127	%REC	1	2/25/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/22/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/22/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
<b>Percent Moisture</b>	<b>2.79</b>		<b>0.010</b>	<b>0.0100</b>	<b>wt%</b>	<b>1</b>	<b>2/19/2008</b>
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>				Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.65	0.650	mg/Kg	5	2/20/2008
<b>Phosphorus, Total (As P)</b>	<b>96.8</b>		<b>1.0</b>	<b>2.50</b>	<b>mg/Kg</b>	<b>5</b>	<b>2/20/2008</b>
Phosphorus, Total Orthophosphate (As P)	U		0.65	0.650	mg/Kg	5	2/20/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SiD</b>				Analyst: <b>IGF</b>
<b>Silica, Dissolved (as SiO2)</b>	<b>33.2</b>		<b>0.040</b>	<b>0.200</b>	<b>mg/kg</b>	<b>2</b>	<b>2/26/2008</b>

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

**e-Lab Analytical, Inc.**
**Date:** February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Deep Borings  
**Sample ID:** F14-SB-6 (13-15)  
**Collection Date:** 2/12/2008 4:23:00 PM

**Work Order:** 0802318  
**Lab ID:** 0802318-02  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>MISCELLANEOUS PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
alpha-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
gamma-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
<b>ORGANOCHLORINE PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
4,4'-DDD	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDE	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDT	U		0.23	3.3	µg/Kg	1	2/24/2008
Aldrin	U		0.20	1.7	µg/Kg	1	2/24/2008
alpha-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
beta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Chlordane	U		3.0	17	µg/Kg	1	2/24/2008
delta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Dieldrin	U		0.20	3.3	µg/Kg	1	2/24/2008
Endosulfan I	U		0.20	1.7	µg/Kg	1	2/24/2008
Endosulfan II	U		0.30	3.3	µg/Kg	1	2/24/2008
Endosulfan sulfate	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin	U		0.22	3.3	µg/Kg	1	2/24/2008
Endrin aldehyde	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin ketone	U		0.25	3.3	µg/Kg	1	2/24/2008
gamma-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor epoxide	U		0.20	1.7	µg/Kg	1	2/24/2008
Methoxychlor	U		1.7	17	µg/Kg	1	2/24/2008
Toxaphene	U		5.8	17	µg/Kg	1	2/24/2008
Surr: Decachlorobiphenyl	88.0			59-144	%REC	1	2/24/2008
Surr: Tetrachloro-m-xylene	77.7			56.9-130	%REC	1	2/24/2008
<b>CHLORINATED HERBICIDES</b>							
			Method: <b>SW8151</b>		Prep: SW3550 / 2/22/08		Analyst: <b>JLJ</b>
2,4,5-T	U		0.60	3.3	µg/Kg	1	2/24/2008
2,4,5-TP (Silvex)	U		0.50	3.3	µg/Kg	1	2/24/2008
2,4-D	U		1.0	6.6	µg/Kg	1	2/24/2008
2,4-DB	U		1.7	6.6	µg/Kg	1	2/24/2008
Dalapon	U		1.6	3.3	µg/Kg	1	2/24/2008
Dicamba	U		1.5	3.3	µg/Kg	1	2/24/2008
Dichlorprop	U		3.0	6.6	µg/Kg	1	2/24/2008
Dinoseb	U		0.50	3.3	µg/Kg	1	2/24/2008
MCPA	U		150	660	µg/Kg	1	2/24/2008
MCPP	U		140	660	µg/Kg	1	2/24/2008
Surr: DCAA	107			30-150	%REC	1	2/24/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

AR Page 4 of 19

# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Deep Borings  
**Sample ID:** F14-SB-6 (13-15)  
**Collection Date:** 2/12/2008 4:23:00 PM

**Work Order:** 0802318  
**Lab ID:** 0802318-02  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	96.6			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	89.7			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	U		0.50	1.7	mg/Kg	1	2/22/2008
Surr: 2-Fluorobiphenyl	81.4			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	U		1.4	12.9	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/20/08		Analyst: <b>SA</b>
Aluminum	2,320		35	95.2	mg/Kg	100	2/21/2008
Antimony	0.173	J	0.13	0.476	mg/Kg	1	2/20/2008
Arsenic	1.74		0.12	0.476	mg/Kg	1	2/20/2008
Barium	31.2		0.067	0.476	mg/Kg	1	2/20/2008
Beryllium	0.185	J	0.029	0.476	mg/Kg	1	2/20/2008
Boron	4.48		0.38	2.38	mg/Kg	1	2/20/2008
Cadmium	0.0391	J	0.029	0.476	mg/Kg	1	2/20/2008
Calcium	15,800		9.5	47.6	mg/Kg	1	2/20/2008
Chromium	3.36		0.067	0.476	mg/Kg	1	2/20/2008
Cobalt	1.12		0.016	0.476	mg/Kg	1	2/20/2008
Copper	1.17		0.038	0.476	mg/Kg	1	2/20/2008
Iron	3,130		4.2	47.6	mg/Kg	1	2/20/2008
Lead	2.47		0.086	0.476	mg/Kg	1	2/20/2008
Magnesium	1,590		2.5	47.6	mg/Kg	1	2/20/2008
Manganese	47.3		0.048	0.476	mg/Kg	1	2/20/2008
Molybdenum	0.248	J	0.095	0.476	mg/Kg	1	2/20/2008
Nickel	2.08		0.076	0.476	mg/Kg	1	2/20/2008
Potassium	744		2.5	47.6	mg/Kg	1	2/20/2008
Selenium	0.425	J	0.18	0.476	mg/Kg	1	2/20/2008
Silver	0.110	J	0.019	0.476	mg/Kg	1	2/20/2008
Sodium	370		8.7	47.6	mg/Kg	1	2/20/2008
Strontium	47.0		0.095	0.476	mg/Kg	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Deep Borings  
**Sample ID:** F14-SB-6 (13-15)  
**Collection Date:** 2/12/2008 4:23:00 PM

**Work Order:** 0802318  
**Lab ID:** 0802318-02  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	0.0746	J	0.048	0.476	mg/Kg	1	2/20/2008
Tin	1.12	J	0.38	2.38	mg/Kg	1	2/20/2008
Titanium	69.1		0.067	0.476	mg/Kg	1	2/20/2008
Vanadium	10.0		0.053	0.476	mg/Kg	1	2/20/2008
Zinc	6.58		0.095	0.476	mg/Kg	1	2/20/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>
Lithium	U		4.9	4.90	mg/Kg	1	2/27/2008
<b>LOW-LEVEL TCL SEMIVOLATILE ORGANICS</b>			Method: <b>SW8270</b>		Prep: SW3541 / 2/19/08		Analyst: <b>LG</b>
1,1'-Biphenyl	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,5-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,6-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dimethylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dinitrophenol	U		30	30	µg/Kg	1	2/20/2008
2,4-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2,6-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chloronaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylnaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3&4-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3,3'-Dichlorobenzidine	U		6.6	6.6	µg/Kg	1	2/20/2008
3-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4,6-Dinitro-2-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Bromophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloro-3-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chlorophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Nitroaniline	U		30	30	µg/Kg	1	2/20/2008
4-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acetophenone	U		6.6	6.6	µg/Kg	1	2/20/2008
Anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Atrazine	U		6.6	6.6	µg/Kg	1	2/20/2008
Benz(a)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzaldehyde	U		6.6	6.6	µg/Kg	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Deep Borings  
**Sample ID:** F14-SB-6 (13-15)  
**Collection Date:** 2/12/2008 4:23:00 PM

**Work Order:** 0802318  
**Lab ID:** 0802318-02  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Benzo(a)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(b)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(g,h,i)perylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(k)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroethoxy)methane	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroethyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroisopropyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Bis(2-ethylhexyl)phthalate</b>	<b>15</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Butyl benzyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Caprolactam</b>	<b>15</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Carbazole	U		6.6	6.6	µg/Kg	1	2/20/2008
Chrysene	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Di-n-butyl phthalate</b>	<b>15</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Di-n-octyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenz(a,h)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenzofuran	U		6.6	6.6	µg/Kg	1	2/20/2008
Diethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dimethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluorene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobutadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorocyclopentadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachloroethane	U		6.6	6.6	µg/Kg	1	2/20/2008
Indeno(1,2,3-cd)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Isophorone	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodi-n-propylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodiphenylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
Naphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
Nitrobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Pentachlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenanthrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Surr: 2,4,6-Tribromophenol	82.8			36-126	%REC	1	2/20/2008
Surr: 2-Fluorobiphenyl	75.4			43-125	%REC	1	2/20/2008
Surr: 2-Fluorophenol	82.2			37-125	%REC	1	2/20/2008
Surr: 4-Terphenyl-d14	89.2			32-125	%REC	1	2/20/2008
Surr: Nitrobenzene-d5	68.6			37-125	%REC	1	2/20/2008
Surr: Phenol-d6	87.9			40-125	%REC	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected  
J - Analyte detected below quantitation limits  
B - Analyte detected in the associated Method Blank  
\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits  
P - Dual Column results RPD > 40%  
E - Value above quantitation range  
H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Deep Borings  
**Sample ID:** F14-SB-6 (13-15)  
**Collection Date:** 2/12/2008 4:23:00 PM

**Work Order:** 0802318  
**Lab ID:** 0802318-02  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>			Analyst: <b>RKG</b>	
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichloro-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/25/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/25/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/25/2008
Acetone	U		2.0	25	µg/Kg	1	2/25/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
Bromoform	U		0.50	10	µg/Kg	1	2/25/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/25/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/25/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/25/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/25/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/25/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/25/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/25/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/25/2008
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
<b>Dichloromethane</b>	<b>4.9</b>	<b>J</b>	<b>3.0</b>	<b>10</b>	<b>µg/Kg</b>	<b>1</b>	<b>2/25/2008</b>
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/25/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/25/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/25/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/25/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Deep Borings  
**Sample ID:** F14-SB-6 (13-15)  
**Collection Date:** 2/12/2008 4:23:00 PM

**Work Order:** 0802318  
**Lab ID:** 0802318-02  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Styrene	U		0.70	5.0	µg/Kg	1	2/25/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/25/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/25/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/25/2008
Surr: 1,2-Dichloroethane-d4	100			70-128	%REC	1	2/25/2008
Surr: 4-Bromofluorobenzene	99.0			73-126	%REC	1	2/25/2008
Surr: Dibromofluoromethane	100			71-128	%REC	1	2/25/2008
Surr: Toluene-d8	97.1			73-127	%REC	1	2/25/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/22/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/22/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
Percent Moisture	20.0		0.010	0.0100	wt%	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>				Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.13	0.130	mg/Kg	1	2/20/2008
Phosphorus, Total (As P)	14.2		0.20	0.500	mg/Kg	1	2/20/2008
Phosphorus, Total Orthophosphate (As P)	U		0.13	0.130	mg/Kg	1	2/20/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SID</b>				Analyst: <b>IGF</b>
Silica, Dissolved (as SiO2)	20.3		0.040	0.200	mg/kg	2	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

## e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF- Deep Borings  
 Sample ID: F14-SB-6 (28-30)  
 Collection Date: 2/12/2008 4:46:00 PM

Work Order: 0802318  
 Lab ID: 0802318-03  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	98.3			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	94.0			55-137	%REC	1	2/26/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	U		1.4	13.1	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/20/08		Analyst: <b>SA</b>
Aluminum	5,370		35	94.3	mg/Kg	100	2/21/2008
Antimony	U		0.13	0.472	mg/Kg	1	2/20/2008
Arsenic	2.67		0.12	0.472	mg/Kg	1	2/20/2008
Barium	46.2		0.066	0.472	mg/Kg	1	2/20/2008
Beryllium	0.254	J	0.057	0.943	mg/Kg	2	2/22/2008
Boron	5.32		0.75	4.72	mg/Kg	2	2/22/2008
Cadmium	0.0345	J	0.028	0.472	mg/Kg	1	2/20/2008
Calcium	22,200		940	4,720	mg/Kg	100	2/21/2008
Chromium	4.88		0.066	0.472	mg/Kg	1	2/20/2008
Cobalt	1.79		0.016	0.472	mg/Kg	1	2/20/2008
Copper	2.79		0.038	0.472	mg/Kg	1	2/20/2008
Iron	4,740		4.2	47.2	mg/Kg	1	2/20/2008
Lead	3.31		0.085	0.472	mg/Kg	1	2/20/2008
Magnesium	4,920		2.5	47.2	mg/Kg	1	2/20/2008
Manganese	88.2		0.047	0.472	mg/Kg	1	2/20/2008
Molybdenum	0.309	J	0.094	0.472	mg/Kg	1	2/20/2008
Nickel	3.53		0.075	0.472	mg/Kg	1	2/20/2008
Potassium	1,600		2.5	47.2	mg/Kg	1	2/20/2008
Selenium	0.403	J	0.18	0.472	mg/Kg	1	2/20/2008
Silver	0.101	J	0.019	0.472	mg/Kg	1	2/20/2008
Sodium	463		8.6	47.2	mg/Kg	1	2/20/2008
Strontium	103		0.094	0.472	mg/Kg	1	2/20/2008
Thallium	0.0517	J	0.047	0.472	mg/Kg	1	2/20/2008
Tin	1.18	J	0.38	2.36	mg/Kg	1	2/20/2008
Titanium	93.3		0.066	0.472	mg/Kg	1	2/20/2008
Vanadium	14.5		0.053	0.472	mg/Kg	1	2/20/2008

Qualifiers: U - Analyzed for but Not Detected

S - Spike Recovery outside accepted recovery limits

J - Analyte detected below quantitation limits

P - Dual Column results RPD &gt; 40%

B - Analyte detected in the associated Method Blank

E - Value above quantitation range

\* - Value exceeds Maximum Contaminant Level

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Deep Borings  
**Sample ID:** F14-SB-6 (28-30)  
**Collection Date:** 2/12/2008 4:46:00 PM

**Work Order:** 0802318  
**Lab ID:** 0802318-03  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>Zinc</b>	<b>12.1</b>		<b>0.094</b>	<b>0.472</b>	<b>mg/Kg</b>	<b>1</b>	<b>2/20/2008</b>
<b>ICP METALS, TOTAL - SW6020A</b>		Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>	
<b>Lithium</b>	<b>20.1</b>		<b>4.7</b>	<b>4.67</b>	<b>mg/Kg</b>	<b>1</b>	<b>2/27/2008</b>
<b>LOW-LEVEL TCL SEMIVOLATILE ORGANICS</b>		Method: <b>SW8270</b>		Prep: SW3541 / 2/19/08		Analyst: <b>LG</b>	
1,1'-Biphenyl	U		6.6	6.6	µg/Kg	1	2/25/2008
2,4,5-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/25/2008
2,4,6-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/25/2008
2,4-Dichlorophenol	U		6.6	6.6	µg/Kg	1	2/25/2008
2,4-Dimethylphenol	U		6.6	6.6	µg/Kg	1	2/25/2008
2,4-Dinitrophenol	U		30	30	µg/Kg	1	2/25/2008
2,4-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/25/2008
2,6-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/25/2008
2-Chloronaphthalene	U		6.6	6.6	µg/Kg	1	2/25/2008
2-Chlorophenol	U		6.6	6.6	µg/Kg	1	2/25/2008
2-Methylnaphthalene	U		6.6	6.6	µg/Kg	1	2/25/2008
2-Methylphenol	U		6.6	6.6	µg/Kg	1	2/25/2008
2-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/25/2008
2-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/25/2008
3&4-Methylphenol	U		6.6	6.6	µg/Kg	1	2/25/2008
3,3'-Dichlorobenzidine	U		6.6	6.6	µg/Kg	1	2/25/2008
3-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/25/2008
4,6-Dinitro-2-methylphenol	U		6.6	6.6	µg/Kg	1	2/25/2008
4-Bromophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/25/2008
4-Chloro-3-methylphenol	U		6.6	6.6	µg/Kg	1	2/25/2008
4-Chloroaniline	U		6.6	6.6	µg/Kg	1	2/25/2008
4-Chlorophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/25/2008
4-Nitroaniline	U		30	30	µg/Kg	1	2/25/2008
4-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/25/2008
Acenaphthene	U		6.6	6.6	µg/Kg	1	2/25/2008
Acenaphthylene	U		6.6	6.6	µg/Kg	1	2/25/2008
Acetophenone	U		6.6	6.6	µg/Kg	1	2/25/2008
Anthracene	U		6.6	6.6	µg/Kg	1	2/25/2008
Atrazine	U		6.6	6.6	µg/Kg	1	2/25/2008
Benz(a)anthracene	U		6.6	6.6	µg/Kg	1	2/25/2008
Benzaldehyde	U		6.6	6.6	µg/Kg	1	2/25/2008
Benzo(a)pyrene	U		6.6	6.6	µg/Kg	1	2/25/2008
Benzo(b)fluoranthene	U		6.6	6.6	µg/Kg	1	2/25/2008
Benzo(g,h,i)perylene	U		6.6	6.6	µg/Kg	1	2/25/2008
Benzo(k)fluoranthene	U		6.6	6.6	µg/Kg	1	2/25/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

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## e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF- Deep Borings  
 Sample ID: F14-SB-6 (28-30)  
 Collection Date: 2/12/2008 4:46:00 PM

Work Order: 0802318  
 Lab ID: 0802318-03  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Bis(2-chloroethoxy)methane	U		6.6	6.6	µg/Kg	1	2/25/2008
Bis(2-chloroethyl)ether	U		6.6	6.6	µg/Kg	1	2/25/2008
Bis(2-chloroisopropyl)ether	U		6.6	6.6	µg/Kg	1	2/25/2008
<b>Bis(2-ethylhexyl)phthalate</b>	<b>10</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/25/2008
Butyl benzyl phthalate	U		6.6	6.6	µg/Kg	1	2/25/2008
Caprolactam	U		6.6	6.6	µg/Kg	1	2/25/2008
Carbazole	U		6.6	6.6	µg/Kg	1	2/25/2008
Chrysene	U		6.6	6.6	µg/Kg	1	2/25/2008
<b>Di-n-butyl phthalate</b>	<b>7.8</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/25/2008
Di-n-octyl phthalate	U		6.6	6.6	µg/Kg	1	2/25/2008
Dibenz(a,h)anthracene	U		6.6	6.6	µg/Kg	1	2/25/2008
Dibenzofuran	U		6.6	6.6	µg/Kg	1	2/25/2008
Diethyl phthalate	U		6.6	6.6	µg/Kg	1	2/25/2008
Dimethyl phthalate	U		6.6	6.6	µg/Kg	1	2/25/2008
Fluoranthene	U		6.6	6.6	µg/Kg	1	2/25/2008
Fluorene	U		6.6	6.6	µg/Kg	1	2/25/2008
Hexachlorobenzene	U		6.6	6.6	µg/Kg	1	2/25/2008
Hexachlorobutadiene	U		6.6	6.6	µg/Kg	1	2/25/2008
Hexachlorocyclopentadiene	U		6.6	6.6	µg/Kg	1	2/25/2008
Hexachloroethane	U		6.6	6.6	µg/Kg	1	2/25/2008
Indeno(1,2,3-cd)pyrene	U		6.6	6.6	µg/Kg	1	2/25/2008
Isophorone	U		6.6	6.6	µg/Kg	1	2/25/2008
N-Nitrosodi-n-propylamine	U		6.6	6.6	µg/Kg	1	2/25/2008
N-Nitrosodiphenylamine	U		6.6	6.6	µg/Kg	1	2/25/2008
Naphthalene	U		6.6	6.6	µg/Kg	1	2/25/2008
Nitrobenzene	U		6.6	6.6	µg/Kg	1	2/25/2008
Pentachlorophenol	U		6.6	6.6	µg/Kg	1	2/25/2008
Phenanthrene	U		6.6	6.6	µg/Kg	1	2/25/2008
Phenol	U		6.6	6.6	µg/Kg	1	2/25/2008
Pyrene	U		6.6	6.6	µg/Kg	1	2/25/2008
Surr: 2,4,6-Tribromophenol	75.6			36-126	%REC	1	2/25/2008
Surr: 2-Fluorobiphenyl	82.6			43-125	%REC	1	2/25/2008
Surr: 2-Fluorophenol	82.3			37-125	%REC	1	2/25/2008
Surr: 4-Terphenyl-d14	92.3			32-125	%REC	1	2/25/2008
Surr: Nitrobenzene-d5	71.9			37-125	%REC	1	2/25/2008
Surr: Phenol-d6	88.5			40-125	%REC	1	2/25/2008
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>				Analyst: <b>RKG</b>
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichloro-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/25/2008

Qualifiers: U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Deep Borings  
**Sample ID:** F14-SB-6 (28-30)  
**Collection Date:** 2/12/2008 4:46:00 PM

**Work Order:** 0802318  
**Lab ID:** 0802318-03  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/25/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/25/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/25/2008
Acetone	U		2.0	25	µg/Kg	1	2/25/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
Bromoform	U		0.50	10	µg/Kg	1	2/25/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/25/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/25/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/25/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/25/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/25/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/25/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/25/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/25/2008
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
<b>Dichloromethane</b>	<b>5.4</b>	<b>J</b>	<b>3.0</b>	<b>10</b>	<b>µg/Kg</b>	<b>1</b>	<b>2/25/2008</b>
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/25/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/25/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/25/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/25/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/25/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/25/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Deep Borings  
**Sample ID:** F14-SB-6 (28-30)  
**Collection Date:** 2/12/2008 4:46:00 PM

**Work Order:** 0802318  
**Lab ID:** 0802318-03  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/25/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/25/2008
Surr: 1,2-Dichloroethane-d4	99.9			70-128	%REC	1	2/25/2008
Surr: 4-Bromofluorobenzene	100			73-126	%REC	1	2/25/2008
Surr: Dibromofluoromethane	101			71-128	%REC	1	2/25/2008
Surr: Toluene-d8	98.2			73-127	%REC	1	2/25/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/22/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/22/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
Percent Moisture	<b>5.81</b>		<b>0.010</b>	<b>0.0100</b>	<b>wt%</b>	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>				Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.13	0.130	mg/Kg	1	2/20/2008
Phosphorus, Total (As P)	<b>37.5</b>		<b>0.20</b>	<b>0.500</b>	<b>mg/Kg</b>	1	2/20/2008
Phosphorus, Total Orthophosphate (As P)	U		0.13	0.130	mg/Kg	1	2/20/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SID</b>				Analyst: <b>IGF</b>
Silica, Dissolved (as SiO2)	<b>94.2</b>		<b>0.10</b>	<b>0.500</b>	<b>mg/kg</b>	5	2/26/2008

**Qualifiers:**

U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Deep Borings  
**Sample ID:** F14-SB-6 (113-115)  
**Collection Date:** 2/12/2008 12:30:00 PM

**Work Order:** 0802318  
**Lab ID:** 0802318-04  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>MERCURY, TOTAL</b>							
			Method: SW7471A		Prep: SW7471A / 2/25/08		Analyst: JCJ
Mercury	U		1.4	13.2	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: SW6020		Prep: SW3050A / 2/20/08		Analyst: SA
Aluminum	5,470		35	95.2	mg/Kg	100	2/21/2008
Antimony	U		0.13	0.476	mg/Kg	1	2/20/2008
Arsenic	2.01		0.12	0.476	mg/Kg	1	2/20/2008
Barium	79.8		0.067	0.476	mg/Kg	1	2/20/2008
Beryllium	0.292	J	0.029	0.476	mg/Kg	1	2/20/2008
Boron	6.41		0.38	2.38	mg/Kg	1	2/20/2008
Cadmium	0.0309	J	0.029	0.476	mg/Kg	1	2/20/2008
Calcium	7,430		9.5	47.6	mg/Kg	1	2/20/2008
Chromium	5.28		0.067	0.476	mg/Kg	1	2/20/2008
Cobalt	2.06		0.016	0.476	mg/Kg	1	2/20/2008
Copper	3.65		0.038	0.476	mg/Kg	1	2/20/2008
Iron	5,140		4.2	47.6	mg/Kg	1	2/20/2008
Lead	3.40		0.086	0.476	mg/Kg	1	2/20/2008
Magnesium	2,510		2.5	47.6	mg/Kg	1	2/20/2008
Manganese	83.1		0.048	0.476	mg/Kg	1	2/20/2008
Molybdenum	0.172	J	0.095	0.476	mg/Kg	1	2/20/2008
Nickel	3.87		0.076	0.476	mg/Kg	1	2/20/2008
Potassium	1,640		2.5	47.6	mg/Kg	1	2/20/2008
Selenium	0.452	J	0.18	0.476	mg/Kg	1	2/20/2008
Silver	0.101	J	0.019	0.476	mg/Kg	1	2/20/2008
Sodium	372		8.7	47.6	mg/Kg	1	2/20/2008
Strontium	43.4		0.095	0.476	mg/Kg	1	2/20/2008
Thallium	0.0554	J	0.048	0.476	mg/Kg	1	2/20/2008
Tin	1.05	J	0.38	2.38	mg/Kg	1	2/20/2008
Titanium	92.9		0.067	0.476	mg/Kg	1	2/20/2008
Vanadium	15.2		0.053	0.476	mg/Kg	1	2/20/2008
Zinc	13.7		0.095	0.476	mg/Kg	1	2/20/2008
<b>ICP METALS, TOTAL - SW6020A</b>							
			Method: SW6020		Prep: SW3050A / 2/22/08		Analyst: SA
Lithium	7.86		4.7	4.72	mg/Kg	1	2/27/2008
<b>LOW-LEVEL TCL SEMIVOLATILE ORGANICS</b>							
			Method: SW8270		Prep: SW3541 / 2/19/08		Analyst: LG
1,1'-Biphenyl	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,5-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,6-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dimethylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Deep Borings  
**Sample ID:** F14-SB-6 (113-115)  
**Collection Date:** 2/12/2008 12:30:00 PM

**Work Order:** 0802318  
**Lab ID:** 0802318-04  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
2,4-Dinitrophenol	U		30	30	µg/Kg	1	2/20/2008
2,4-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2,6-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chloronaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylnaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3&4-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3,3'-Dichlorobenzidine	U		6.6	6.6	µg/Kg	1	2/20/2008
3-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4,6-Dinitro-2-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Bromophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloro-3-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chlorophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Nitroaniline	U		30	30	µg/Kg	1	2/20/2008
4-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acetophenone	U		6.6	6.6	µg/Kg	1	2/20/2008
Anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Atrazine	U		6.6	6.6	µg/Kg	1	2/20/2008
Benz(a)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzaldehyde	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(a)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(b)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(g,h,i)perylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(k)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroethoxy)methane	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroethyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroisopropyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Bis(2-ethylhexyl)phthalate</b>	<b>15</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Butyl benzyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Caprolactam	U		6.6	6.6	µg/Kg	1	2/20/2008
Carbazole	U		6.6	6.6	µg/Kg	1	2/20/2008
Chrysene	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Di-n-butyl phthalate</b>	<b>8.2</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Di-n-octyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected  
J - Analyte detected below quantitation limits  
B - Analyte detected in the associated Method Blank  
\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits  
P - Dual Column results RPD > 40%  
E - Value above quantitation range  
H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**
**Date:** February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Deep Borings  
**Sample ID:** F14-SB-6 (113-115)  
**Collection Date:** 2/12/2008 12:30:00 PM

**Work Order:** 0802318  
**Lab ID:** 0802318-04  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Dibenz(a,h)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenzofuran	U		6.6	6.6	µg/Kg	1	2/20/2008
Diethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dimethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluorene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobutadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorocyclopentadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachloroethane	U		6.6	6.6	µg/Kg	1	2/20/2008
Indeno(1,2,3-cd)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Isophorone	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodi-n-propylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodiphenylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
Naphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
Nitrobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Pentachlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenanthrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Surr: 2,4,6-Tribromophenol	75.0			36-126	%REC	1	2/20/2008
Surr: 2-Fluorobiphenyl	75.9			43-125	%REC	1	2/20/2008
Surr: 2-Fluorophenol	68.4			37-125	%REC	1	2/20/2008
Surr: 4-Terphenyl-d14	89.3			32-125	%REC	1	2/20/2008
Surr: Nitrobenzene-d5	73.0			37-125	%REC	1	2/20/2008
Surr: Phenol-d6	73.8			40-125	%REC	1	2/20/2008

**TCL VOLATILE ORGANICS**

 Method: **SW8260**

 Analyst: **RKG**

1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008

**Qualifiers:** U - Analyzed for but Not Detected  
 J - Analyte detected below quantitation limits  
 B - Analyte detected in the associated Method Blank  
 \* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits  
 P - Dual Column results RPD > 40%  
 E - Value above quantitation range  
 H - Analyzed outside of Hold Time

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## e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF- Deep Borings  
 Sample ID: F14-SB-6 (113-115)  
 Collection Date: 2/12/2008 12:30:00 PM

Work Order: 0802318  
 Lab ID: 0802318-04  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/25/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/25/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/25/2008
Acetone	U		2.0	25	µg/Kg	1	2/25/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
Bromoform	U		0.50	10	µg/Kg	1	2/25/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/25/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/25/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/25/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/25/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/25/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/25/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/25/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/25/2008
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
<b>Dichloromethane</b>	<b>5.3</b>	<b>J</b>	<b>3.0</b>	<b>10</b>	<b>µg/Kg</b>	<b>1</b>	<b>2/25/2008</b>
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/25/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/25/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/25/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/25/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/25/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/25/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/25/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/25/2008
Surr: 1,2-Dichloroethane-d4	102			70-128	%REC	1	2/25/2008
Surr: 4-Bromofluorobenzene	102			73-126	%REC	1	2/25/2008
Surr: Dibromofluoromethane	100			71-128	%REC	1	2/25/2008
Surr: Toluene-d8	99.5			73-127	%REC	1	2/25/2008

## CYANIDE, TOTAL

Method: SW9014

Analyst: RPM

Qualifiers: U - Analyzed for but Not Detected

S - Spike Recovery outside accepted recovery limits

J - Analyte detected below quantitation limits

P - Dual Column results RPD &gt; 40%

B - Analyte detected in the associated Method Blank

E - Value above quantitation range

\* - Value exceeds Maximum Contaminant Level

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF- Deep Borings  
**Sample ID:** F14-SB-6 (113-115)  
**Collection Date:** 2/12/2008 12:30:00 PM

**Work Order:** 0802318  
**Lab ID:** 0802318-04  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Cyanide	U		0.60	2.00	mg/Kg	1	2/22/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/22/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
<b>Percent Moisture</b>	<b>8.38</b>		<b>0.010</b>	<b>0.0100</b>	<b>wt%</b>	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>				Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.13	0.130	mg/Kg	1	2/20/2008
<b>Phosphorus, Total (As P)</b>	<b>17.1</b>		<b>0.20</b>	<b>0.500</b>	<b>mg/Kg</b>	1	2/20/2008
Phosphorus, Total Orthophosphate (As P)	U		0.13	0.130	mg/Kg	1	2/20/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SID</b>				Analyst: <b>IGF</b>
<b>Silica, Dissolved (as SiO2)</b>	<b>196</b>		<b>0.20</b>	<b>1.00</b>	<b>mg/kg</b>	10	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

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## e-Lab Analytical, Inc.

Date: Feb 28 2008

CLIENT: Malcolm Pirnie, Inc.

## QC BATCH REPORT

Work Order: 0802318

Project: Oro Grande LF- Deep Borings

Batch ID: 28324

Instrument ID ECD\_1

Method: SW8081

MBLK		Sample ID: PBLKS1-080220			Units: µg/Kg		Analysis Date: 02/24/08 12:45			
Client ID:		Run ID: ECD_1_080223D			SeqNo: 1335513		Prep Date: 2/20/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	U	3.3								
4,4'-DDE	U	3.3								
4,4'-DDT	U	3.3								
Aldrin	U	1.7								
alpha-BHC	U	1.7								
beta-BHC	U	1.7								
Chlordane	U	17								
delta-BHC	U	1.7								
Dieldrin	U	3.3								
Endosulfan I	U	1.7								
Endosulfan II	U	3.3								
Endosulfan sulfate	U	3.3								
Endrin	U	3.3								
Endrin aldehyde	U	3.3								
Endrin ketone	U	3.3								
gamma-BHC	U	1.7								
Heptachlor	U	1.7								
Heptachlor epoxide	U	1.7								
Methoxychlor	U	17								
Toxaphene	U	17								
Surr: Decachlorobiphenyl	6.233	3.3	6.667	0	93.5	59-144	0			
Surr: Tetrachloro-m-xylene	5.783	1.6	6.667	0	86.7	56.9-130	0			

MBLK		Sample ID: PBLKS1-080220			Units: µg/Kg		Analysis Date: 02/24/08 12:45			
Client ID:		Run ID: ECD_1_080223D			SeqNo: 1335528		Prep Date: 2/20/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	U	1.7								
gamma-Chlordane	U	1.7								

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is &gt; 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference &gt; 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 1 of 35

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: **28324** Instrument ID **ECD\_1** Method: **SW8081**

LCS		Sample ID: <b>PLCSS1-080220</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 13:19</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335514</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	15.86	3.3	16.67	0	95.1	53-138	0			
4,4'-DDE	15.64	3.3	16.67	0	93.8	57-136	0			
4,4'-DDT	16.11	3.3	16.67	0	96.7	53-139	0			
Aldrin	6.995	1.7	8.333	0	83.9	52-130	0			
alpha-BHC	7.352	1.7	8.333	0	88.2	52-130	0			
beta-BHC	7.426	1.7	8.333	0	89.1	62-130	0			
delta-BHC	7.077	1.7	8.333	0	84.9	41-137	0			
Dieldrin	15.4	3.3	16.67	0	92.4	54-138	0			
Endosulfan I	7.705	1.7	8.333	0	92.5	55-132	0			
Endosulfan II	15.06	3.3	16.67	0	90.3	59-134	0			
Endosulfan sulfate	16.07	3.3	16.67	0	96.4	54-141	0			
Endrin	19.29	3.3	16.67	0	116	60-157	0			
Endrin aldehyde	13.7	3.3	16.67	0	82.2	56-146	0			
Endrin ketone	16.81	3.3	16.67	0	101	56-153	0			
gamma-BHC	7.702	1.7	8.333	0	92.4	52-133	0			
Heptachlor	7.62	1.7	8.333	0	91.4	54-134	0			
Heptachlor epoxide	7.397	1.7	8.333	0	88.8	58-130	0			
Methoxychlor	85.99	17	83.33	0	103	60-140	0			
Surr: Decachlorobiphenyl	6.944	3.3	6.667	0	104	60-150	0			
Surr: Tetrachloro-m-xylene	6.044	1.6	6.667	0	90.7	60-135	0			

LCS		Sample ID: <b>PLCSS1-080220</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 13:19</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335529</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	7.175	1.7	8.333	0	86.1	55-132	0			
gamma-Chlordane	7.337	1.7	8.333	0	88	60-129	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: **28324** Instrument ID **ECD\_1** Method: **SW8081**

MS		Sample ID: <b>0802304-01DMS</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 16:10</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335519</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	15	3.3	16.64	0	90.1	53-138	0			
4,4'-DDE	14.96	3.3	16.64	0	89.9	57-136	0			
4,4'-DDT	14.92	3.3	16.64	0	89.6	53-139	0			
Aldrin	6.584	1.7	8.319	0	79.1	52-130	0			
alpha-BHC	7.075	1.7	8.319	0	85	52-130	0			
beta-BHC	7.523	1.7	8.319	0	90.4	62-130	0			
delta-BHC	7.593	1.7	8.319	0	91.3	41-137	0			
Dieldrin	14.83	3.3	16.64	0	89.1	54-138	0			
Endosulfan I	7.343	1.7	8.319	0	88.3	55-132	0			
Endosulfan II	14.5	3.3	16.64	0	87.2	59-134	0			
Endosulfan sulfate	16.35	3.3	16.64	0	98.2	54-141	0			
Endrin	18.47	3.3	16.64	0	111	60-157	0			
Endrin aldehyde	15.69	3.3	16.64	0	94.3	56-146	0			
Endrin ketone	16.93	3.3	16.64	0	102	56-153	0			
gamma-BHC	7.268	1.7	8.319	0	87.4	52-133	0			
Heptachlor	7.272	1.7	8.319	0	87.4	54-134	0			
Heptachlor epoxide	6.87	1.7	8.319	0	82.6	58-130	0			
Methoxychlor	85.56	17	83.19	0	103	60-140	0			
Surr: Decachlorobiphenyl	6.142	3.3	6.656	0	92.3	60-150	0			
Surr: Tetrachloro-m-xylene	5.499	1.6	6.656	0	82.6	60-135	0			

MS		Sample ID: <b>0802304-01DMS</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 16:10</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335534</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	6.877	1.7	8.319	0	82.7	55-132	0			
gamma-Chlordane	7.267	1.7	8.319	0	87.3	60-129	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range



CLIENT: Malcolm Pirnie, Inc.  
Work Order: 0802318  
Project: Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: **28324** Instrument ID **ECD\_1** Method: **SW8081**

MSD		Sample ID: <b>0802304-01DMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 16:44</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335520</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	14.45	3.3	16.66	0	86.8	53-138	15	3.69	30	
4,4'-DDE	14.54	3.3	16.66	0	87.3	57-136	14.96	2.79	30	
4,4'-DDT	14.49	3.3	16.66	0	87	53-139	14.92	2.9	30	
Aldrin	6.272	1.7	8.331	0	75.3	52-130	6.584	4.85	30	
alpha-BHC	6.759	1.7	8.331	0	81.1	52-130	7.075	4.56	30	
beta-BHC	7.186	1.7	8.331	0	86.3	62-130	7.523	4.59	30	
delta-BHC	7.229	1.7	8.331	0	86.8	41-137	7.593	4.91	30	
Dieldrin	14.31	3.3	16.66	0	85.9	54-138	14.83	3.59	30	
Endosulfan I	7.109	1.7	8.331	0	85.3	55-132	7.343	3.24	30	
Endosulfan II	14	3.3	16.66	0	84	59-134	14.5	3.55	30	
Endosulfan sulfate	15.64	3.3	16.66	0	93.9	54-141	16.35	4.41	30	
Endrin	17.77	3.3	16.66	0	107	60-157	18.47	3.88	30	
Endrin aldehyde	15.22	3.3	16.66	0	91.3	56-146	15.69	3.1	30	
Endrin ketone	16.55	3.3	16.66	0	99.3	56-153	16.93	2.29	30	
gamma-BHC	6.934	1.7	8.331	0	83.2	52-133	7.268	4.7	30	
Heptachlor	6.941	1.7	8.331	0	83.3	54-134	7.272	4.65	30	
Heptachlor epoxide	6.668	1.7	8.331	0	80	58-130	6.87	2.98	30	
Methoxychlor	83.98	17	83.31	0	101	60-140	85.56	1.86	30	
Surr: Decachlorobiphenyl	6.005	3.3	6.664	0	90.1	60-150	6.142	2.25	30	
Surr: Tetrachloro-m-xylene	5.218	1.6	6.664	0	78.3	60-135	5.499	5.25	30	

MSD		Sample ID: <b>0802304-01DMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 16:44</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335535</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	6.624	1.7	8.331	0	79.5	55-132	6.877	3.75	30	
gamma-Chlordane	7.218	1.7	8.331	0	86.6	60-129	7.267	0.676	30	

The following samples were analyzed in this batch:

0802318-02D

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

# QC BATCH REPORT

Batch ID: **28325** Instrument ID **ECD\_7** Method: **SW8082**

MBLK		Sample ID: <b>PBLKS2-080220</b>		Units: <b>µg/Kg</b>		Analysis Date: <b>02/25/08 23:35</b>				
Client ID:		Run ID: <b>ECD_7_080225A</b>		SeqNo: <b>1335803</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	U	17								
Aroclor 1221	U	17								
Aroclor 1232	U	17								
Aroclor 1242	U	17								
Aroclor 1248	U	17								
Aroclor 1254	U	17								
Aroclor 1260	U	17								
Surr: Decachlorobiphenyl	6.346	1.6	6.667	0	95.2	54-143	0			
Surr: Tetrachloro-m-xylene	6.115	1.6	6.667	0	91.7	55-137	0			

LCS		Sample ID: <b>PLCSS2-080220</b>		Units: <b>µg/Kg</b>		Analysis Date: <b>02/26/08 0:09</b>				
Client ID:		Run ID: <b>ECD_7_080225A</b>		SeqNo: <b>1335804</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	149.8	17	166.7	0	89.9	53-135	0			
Aroclor 1260	158.4	17	166.7	0	95	54-137	0			
Surr: Decachlorobiphenyl	7.065	1.6	6.667	0	106	54-143	0			
Surr: Tetrachloro-m-xylene	6.785	1.6	6.667	0	102	55-137	0			

MS		Sample ID: <b>0802304-02CMS</b>		Units: <b>µg/Kg</b>		Analysis Date: <b>02/26/08 6:24</b>				
Client ID:		Run ID: <b>ECD_7_080225A</b>		SeqNo: <b>1335815</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	151.3	17	166.4	0	91	53-135	0			
Aroclor 1260	162.9	17	166.4	0	97.9	54-137	0			
Surr: Decachlorobiphenyl	6.282	1.6	6.656	0	94.4	54-143	0			
Surr: Tetrachloro-m-xylene	6.143	1.6	6.656	0	92.3	55-137	0			

MSD		Sample ID: <b>0802304-02CMSD</b>		Units: <b>µg/Kg</b>		Analysis Date: <b>02/26/08 6:58</b>				
Client ID:		Run ID: <b>ECD_7_080225A</b>		SeqNo: <b>1335816</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	154.1	17	166.6	0	92.5	53-135	151.3	1.84	30	
Aroclor 1260	165.8	17	166.6	0	99.5	54-137	162.9	1.75	30	
Surr: Decachlorobiphenyl	6.443	1.6	6.664	0	96.7	54-143	6.282	2.54	30	
Surr: Tetrachloro-m-xylene	6.248	1.6	6.664	0	93.8	55-137	6.143	1.7	30	

The following samples were analyzed in this batch:

0802318-01C	0802318-02C	0802318-03C
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ND - Not Detected at the Reporting Limit  
J - Analyte detected below quantitation limits  
O - Referenced analyte value is > 4 times amount spiked  
S - Spike Recovery outside accepted recovery limits  
R - RPD outside accepted recovery limits  
P - Dual Column results percent difference > 40%  
B - Analyte detected in assoc. Method Blank  
U - Analyzed for but not detected  
E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: **28371** Instrument ID **ECD\_5** Method: **SW8151**

**MBLK** Sample ID: **HBLKS1-080222** Units: **µg/Kg** Analysis Date: **02/24/08 12:20**

Client ID: Run ID: **ECD\_5\_080221C** SeqNo: **1335482** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	U	3.3								
2,4,5-TP (Silvex)	U	3.3								
2,4-D	U	6.6								
2,4-DB	U	6.6								
Dalapon	U	3.3								
Dicamba	U	3.3								
Dichlorprop	U	6.6								
Dinoseb	U	3.3								
MCPA	U	660								
MCPP	U	660								
Surr: DCAA	187.5	6.6	166.7	0	113	30-150	0			

**LCS** Sample ID: **HLCSS1-080222** Units: **µg/Kg** Analysis Date: **02/24/08 12:57**

Client ID: Run ID: **ECD\_5\_080221C** SeqNo: **1335483** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	82.53	3.3	83.33	0	99	50-150	0			
2,4,5-TP (Silvex)	93.76	3.3	83.33	0	113	50-150	0			
2,4-D	68.06	6.6	83.33	0	81.7	40-150	0			
2,4-DB	86.73	6.6	83.33	0	104	40-150	0			
Dalapon	88.32	3.3	83.33	0	106	30-150	0			
Dicamba	77.37	3.3	83.33	0	92.8	40-150	0			
Dichlorprop	83.16	6.6	83.33	0	99.8	40-150	0			
Dinoseb	77.29	3.3	83.33	0	92.7	40-150	0			
MCPA	7051	660	8333	0	84.6	40-150	0			
MCPP	7660	660	8333	0	91.9	40-150	0			
Surr: DCAA	176.7	6.6	166.7	0	106	50-150	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: **28371** Instrument ID **ECD\_5** Method: **SW8151**

MS		Sample ID: <b>0802304-01DMS</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 15:26</b>		
Client ID:		Run ID: <b>ECD_5_080221C</b>				SeqNo: <b>1335504</b>		Prep Date: <b>2/22/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	67.56	3.3	83.22	0	81.2	50-150	0			
2,4,5-TP (Silvex)	66.67	3.3	83.22	0	80.1	50-150	0			
2,4-D	53.91	6.6	83.22	0	64.8	40-150	0			
2,4-DB	77.8	6.6	83.22	0	93.5	40-150	0			
Dalapon	63.74	3.3	83.22	0	76.6	30-150	0			
Dicamba	55.25	3.3	83.22	0	66.4	40-150	0			
Dichlorprop	63.97	6.6	83.22	0	76.9	40-150	0			
Dinoseb	72	3.3	83.22	0	86.5	40-150	0			
MCPA	5862	660	8322	0	70.4	40-150	0			
MCP	4491	660	8322	0	54	40-150	0			P
Surr: DCAA	92.07	6.6	166.4	0	55.3	50-150	0			

MSD		Sample ID: <b>0802304-01DMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 16:03</b>		
Client ID:		Run ID: <b>ECD_5_080221C</b>				SeqNo: <b>1335505</b>		Prep Date: <b>2/22/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	67.98	3.3	83.31	0	81.6	50-150	67.56	0.626	30	
2,4,5-TP (Silvex)	65.83	3.3	83.31	0	79	50-150	66.67	1.26	30	
2,4-D	54.52	6.6	83.31	0	65.4	40-150	53.91	1.12	30	
2,4-DB	78.07	6.6	83.31	0	93.7	40-150	77.8	0.346	30	
Dalapon	62.65	3.3	83.31	0	75.2	30-150	63.74	1.73	30	
Dicamba	55.69	3.3	83.31	0	66.8	40-150	55.25	0.787	30	
Dichlorprop	63.76	6.6	83.31	0	76.5	40-150	63.97	0.332	30	
Dinoseb	72.28	3.3	83.31	0	86.8	40-150	72	0.387	30	
MCPA	6291	660	8331	0	75.5	40-150	5862	7.06	30	
MCP	4425	660	8331	0	53.1	40-150	4491	1.47	30	P
Surr: DCAA	89.52	6.6	166.6	0	53.7	50-150	92.07	2.8	30	

The following samples were analyzed in this batch:

0802318-02D

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: **28331** Instrument ID **FID-2** Method: **SW8015M**

<b>MBLK</b>	Sample ID: <b>FBLKS1-080221</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 0:05</b>		
Client ID:	Run ID: <b>FID-2_080221A</b>				SeqNo: <b>1336416</b>		Prep Date: <b>2/21/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	U	1.7								
<i>Surr: 2-Fluorobiphenyl</i>	3.292	0.10	3.333	0	98.8	70-130	0			

<b>LCS</b>	Sample ID: <b>FLCSS1-080221</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 0:55</b>		
Client ID:	Run ID: <b>FID-2_080221A</b>				SeqNo: <b>1336417</b>		Prep Date: <b>2/21/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	39.46	1.7	33.33	0	118	70-130	0			
<i>Surr: 2-Fluorobiphenyl</i>	3.922	0.10	3.333	0	118	70-130	0			

<b>MS</b>	Sample ID: <b>0802304-01CMS</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 6:46</b>		
Client ID:	Run ID: <b>FID-2_080221A</b>				SeqNo: <b>1336424</b>		Prep Date: <b>2/21/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	36.64	1.7	33.32	0.3677	109	70-130	0			
<i>Surr: 2-Fluorobiphenyl</i>	3.646	0.10	3.332	0	109	70-130	0			

<b>MSD</b>	Sample ID: <b>0802304-01CMSD</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 7:36</b>		
Client ID:	Run ID: <b>FID-2_080221A</b>				SeqNo: <b>1336425</b>		Prep Date: <b>2/21/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	36.1	1.7	33.3	0.3677	107	70-130	36.64	1.51	30	
<i>Surr: 2-Fluorobiphenyl</i>	3.461	0.10	3.33	0	104	70-130	3.646	5.18	30	

The following samples were analyzed in this batch:

0802318-01C	0802318-02C
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ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: **28320** Instrument ID **ICP7500** Method: **SW6020**

MBLK		Sample ID: <b>MBLKS1-022008</b>			Units: <b>mg/Kg</b>			Analysis Date: <b>02/20/08 17:15</b>		
Client ID:		Run ID: <b>ICP7500_080220A</b>			SeqNo: <b>1331444</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	U	0.50								
Arsenic	U	0.50								
Barium	0.1763	0.50								J
Beryllium	U	0.50								
Boron	U	2.5								
Cadmium	U	0.50								
Calcium	U	50								
Chromium	U	0.50								
Cobalt	U	0.50								
Copper	0.2296	0.50								J
Iron	U	50								
Lead	U	0.50								
Magnesium	U	50								
Manganese	U	0.50								
Molybdenum	U	0.50								
Nickel	U	0.50								
Potassium	U	50								
Selenium	0.2529	0.50								J
Silver	0.1023	0.50								J
Sodium	U	50								
Strontium	U	0.50								
Thallium	U	0.50								
Tin	1.129	2.5								J
Titanium	U	0.50								
Vanadium	0.1491	0.50								J
Zinc	U	0.50								

MBLK		Sample ID: <b>MBLKS1-022008</b>			Units: <b>mg/Kg</b>			Analysis Date: <b>02/21/08 13:02</b>		
Client ID:		Run ID: <b>ICP7500_080221A</b>			SeqNo: <b>1332010</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	0.6331	1.0								J

ND - Not Detected at the Reporting Limit  
J - Analyte detected below quantitation limits  
O - Referenced analyte value is > 4 times amount spiked  
S - Spike Recovery outside accepted recovery limits  
R - RPD outside accepted recovery limits  
P - Dual Column results percent difference > 40%  
B - Analyte detected in assoc. Method Blank  
U - Analyzed for but not detected  
E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

# QC BATCH REPORT

Batch ID: **28320** Instrument ID **ICP7500** Method: **SW6020**

LCS		Sample ID: <b>MLCSS1-022008</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 17:21</b>		
Client ID:		Run ID: <b>ICP7500_080220A</b>				SeqNo: <b>1331445</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	10.64	0.50	10	0	106	80-120	0			
Arsenic	9.387	0.50	10	0	93.9	80-120	0			
Barium	8.796	0.50	10	0	88	80-120	0			
Beryllium	8.499	0.50	10	0	85	80-120	0			
Boron	45.25	2.5	50	0	90.5	80-120	0			
Cadmium	8.779	0.50	10	0	87.8	80-120	0			
Calcium	941.4	50	1000	0	94.1	80-120	0			
Chromium	9.872	0.50	10	0	98.7	80-120	0			
Cobalt	10.2	0.50	10	0	102	80-120	0			
Copper	8.508	0.50	10	0	85.1	80-120	0			
Iron	907.2	50	1000	0	90.7	80-120	0			
Lead	8.981	0.50	10	0	89.8	80-120	0			
Magnesium	955.5	50	1000	0	95.6	80-120	0			
Manganese	9.71	0.50	10	0	97.1	80-120	0			
Molybdenum	9.003	0.50	10	0	90	80-120	0			
Nickel	8.559	0.50	10	0	85.6	80-120	0			
Potassium	953.2	50	1000	0	95.3	80-120	0			
Selenium	8.42	0.50	10	0	84.2	80-120	0			
Silver	8.833	0.50	10	0	88.3	80-120	0			
Sodium	928.3	50	1000	0	92.8	80-120	0			
Strontium	9.477	0.50	10	0	94.8	80-120	0			
Thallium	8.28	0.50	10	0	82.8	80-120	0			
Tin	10.24	2.5	10	0	102	80-120	0			
Titanium	18.18	0.50	20	0	90.9	80-120	0			
Vanadium	10.18	0.50	10	0	102	80-120	0			
Zinc	8.711	0.50	10	0	87.1	80-120	0			

LCS		Sample ID: <b>MLCSS1-022008</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/21/08 13:08</b>		
Client ID:		Run ID: <b>ICP7500_080221A</b>				SeqNo: <b>1332011</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	8.937	1.0	10	0	89.4	80-120	0			

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

# QC BATCH REPORT

Batch ID: **28320** Instrument ID **ICP7500** Method: **SW6020**

MS		Sample ID: <b>0802326-06CMS</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 19:38</b>		
Client ID:		Run ID: <b>ICP7500_080220A</b>				SeqNo: <b>1331475</b>		Prep Date: <b>2/20/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	6.395	0.48	9.615	0.1028	65.4	75-125	0			S
Arsenic	11.38	0.48	9.615	2.707	90.2	75-125	0			
Barium	77.33	0.48	9.615	30.04	492	75-125	0			S
Beryllium	7.814	0.48	9.615	0.1474	79.7	75-125	0			
Boron	45.81	2.4	48.08	4.882	85.1	75-125	0			
Cadmium	8.122	0.48	9.615	0.01902	84.3	75-125	0			
Calcium	11580	48	961.5	11180	41	75-125	0			SO
Chromium	12.39	0.48	9.615	3.049	97.2	75-125	0			
Cobalt	10.14	0.48	9.615	0.9517	95.6	75-125	0			
Copper	8.359	0.48	9.615	0.911	77.5	75-125	0			
Iron	3812	48	961.5	2791	106	75-125	0			
Lead	10.63	0.48	9.615	2.301	86.7	75-125	0			
Magnesium	2767	48	961.5	1772	104	75-125	0			
Manganese	41.98	0.48	9.615	32.92	94.2	75-125	0			
Molybdenum	8.088	0.48	9.615	0.1188	82.9	75-125	0			
Nickel	9.571	0.48	9.615	1.879	80	75-125	0			
Potassium	1777	48	961.5	809	101	75-125	0			
Selenium	8.052	0.48	9.615	0.3524	80.1	75-125	0			
Silver	7.929	0.48	9.615	0.1002	81.4	75-125	0			
Sodium	1362	48	961.5	453.8	94.5	75-125	0			
Strontium	103.2	0.48	9.615	43.66	619	75-125	0			SO
Thallium	7.51	0.48	9.615	0.0295	77.8	75-125	0			
Tin	9.144	2.4	9.615	1.089	83.8	75-125	0			
Titanium	83.28	0.48	19.23	65.6	92	75-125	0			
Vanadium	21.8	0.48	9.615	12.35	98.3	75-125	0			
Zinc	14.62	0.48	9.615	5.852	91.1	75-125	0			

MS		Sample ID: <b>0802326-06CMS</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 19:38</b>		
Client ID:		Run ID: <b>ICP7500_080220A</b>				SeqNo: <b>1333844</b>		Prep Date: <b>2/20/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	2900	0.96	9.615	2338	5840	75-125	0			SEO

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

# QC BATCH REPORT

Batch ID: **28320** Instrument ID **ICP7500** Method: **SW6020**

MSD		Sample ID: <b>0802326-06CMSD</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 19:44</b>		
Client ID:		Run ID: <b>ICP7500_080220A</b>				SeqNo: <b>1331476</b>		Prep Date: <b>2/20/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	6.59	0.48	9.615	0.1028	67.5	75-125	6.395	3.01	25	S
Arsenic	11.4	0.48	9.615	2.707	90.4	75-125	11.38	0.169	25	
Barium	28.5	0.48	9.615	30.04	-16	75-125	77.33	92.3	25	SR
Beryllium	7.843	0.48	9.615	0.1474	80	75-125	7.814	0.368	25	
Boron	45.91	2.4	48.08	4.882	85.3	75-125	45.81	0.231	25	
Cadmium	8.173	0.48	9.615	0.01902	84.8	75-125	8.122	0.625	25	
Calcium	11330	48	961.5	11180	15	75-125	11580	2.18	25	SO
Chromium	12.42	0.48	9.615	3.049	97.5	75-125	12.39	0.232	25	
Cobalt	10.2	0.48	9.615	0.9517	96.2	75-125	10.14	0.567	25	
Copper	8.37	0.48	9.615	0.911	77.6	75-125	8.359	0.138	25	
Iron	3839	48	961.5	2791	109	75-125	3812	0.729	25	
Lead	10.74	0.48	9.615	2.301	87.8	75-125	10.63	0.99	25	
Magnesium	2776	48	961.5	1772	104	75-125	2767	0.312	25	
Manganese	51.03	0.48	9.615	32.92	188	75-125	41.98	19.5	25	S
Molybdenum	8.345	0.48	9.615	0.1188	85.6	75-125	8.088	3.14	25	
Nickel	9.593	0.48	9.615	1.879	80.2	75-125	9.571	0.231	25	
Potassium	1779	48	961.5	809	101	75-125	1777	0.108	25	
Selenium	8.029	0.48	9.615	0.3524	79.8	75-125	8.052	0.287	25	
Silver	8.469	0.48	9.615	0.1002	87	75-125	7.929	6.59	25	
Sodium	1360	48	961.5	453.8	94.2	75-125	1362	0.212	25	
Strontium	54.07	0.48	9.615	43.66	108	75-125	103.2	62.5	25	RO
Thallium	7.699	0.48	9.615	0.0295	79.8	75-125	7.51	2.49	25	
Tin	9.198	2.4	9.615	1.089	84.3	75-125	9.144	0.587	25	
Titanium	86.74	0.48	19.23	65.6	110	75-125	83.28	4.07	25	
Vanadium	22.14	0.48	9.615	12.35	102	75-125	21.8	1.58	25	
Zinc	14.45	0.48	9.615	5.852	89.4	75-125	14.62	1.12	25	

MSD		Sample ID: <b>0802326-06CMSD</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 19:44</b>		
Client ID:		Run ID: <b>ICP7500_080220A</b>				SeqNo: <b>1333846</b>		Prep Date: <b>2/20/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	2885	0.96	9.615	2338	5680	75-125	2900	0.532	25	SEO

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J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

# QC BATCH REPORT

Batch ID: **28320** Instrument ID **ICP7500** Method: **SW6020**

DUP		Sample ID: <b>0802326-06CDUP</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 19:26</b>		
Client ID:		Run ID: <b>ICP7500_080220A</b>				SeqNo: <b>1331474</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	U	0.48	0	0	0	0-0	0.1028	0	25	
Arsenic	2.794	0.48	0	0	0	0-0	2.707	3.18	25	
Barium	22.76	0.48	0	0	0	0-0	30.04	27.6	25	R
Beryllium	0.1479	0.48	0	0	0	0-0	0.1474	0	25	J
Boron	4.84	2.4	0	0	0	0-0	4.882	0.851	25	
Cadmium	U	0.48	0	0	0	0-0	0.01902	0	25	
Calcium	10590	48	0	0	0	0-0	11180	5.48	25	
Chromium	3.134	0.48	0	0	0	0-0	3.049	2.74	25	
Cobalt	0.9415	0.48	0	0	0	0-0	0.9517	1.08	25	
Copper	0.9185	0.48	0	0	0	0-0	0.911	0.82	25	
Iron	2841	48	0	0	0	0-0	2791	1.78	25	
Lead	2.313	0.48	0	0	0	0-0	2.301	0.542	25	
Magnesium	1836	48	0	0	0	0-0	1772	3.52	25	
Manganese	32.01	0.48	0	0	0	0-0	32.92	2.81	25	
Molybdenum	0.116	0.48	0	0	0	0-0	0.1188	0	25	J
Nickel	1.884	0.48	0	0	0	0-0	1.879	0.256	25	
Potassium	827.8	48	0	0	0	0-0	809	2.29	25	
Selenium	0.3281	0.48	0	0	0	0-0	0.3524	0	25	J
Silver	0.1	0.48	0	0	0	0-0	0.1002	0	25	J
Sodium	467.9	48	0	0	0	0-0	453.8	3.07	25	
Strontium	51.19	0.48	0	0	0	0-0	43.66	15.9	25	
Thallium	U	0.48	0	0	0	0-0	0.0295	0	25	
Tin	1.104	2.4	0	0	0	0-0	1.089	0	25	J
Titanium	68.36	0.48	0	0	0	0-0	65.6	4.12	25	
Vanadium	12.42	0.48	0	0	0	0-0	12.35	0.621	25	
Zinc	6.092	0.48	0	0	0	0-0	5.852	4.03	25	

DUP		Sample ID: <b>0802326-06CDUP</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/21/08 15:08</b>		
Client ID:		Run ID: <b>ICP7500_080221A</b>				SeqNo: <b>1332029</b>		Prep Date: <b>2/20/2008</b>		DF: <b>100</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	2744	96	0	0	0	0-0	2338	16	25	

The following samples were analyzed in this batch:

0802318-01C	0802318-02D	0802318-03C
0802318-04C		

ND - Not Detected at the Reporting Limit  
J - Analyte detected below quantitation limits  
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R - RPD outside accepted recovery limits  
P - Dual Column results percent difference > 40%  
B - Analyte detected in assoc. Method Blank  
U - Analyzed for but not detected  
E - Value above quantitation range

CLIENT: Malcolm Pirnie, Inc.  
Work Order: 0802318  
Project: Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: **28367** Instrument ID **ICP7500** Method: **SW6020**

<b>MBLK</b>	Sample ID: <b>MBLKS1-022208</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/27/08 12:50</b>		
Client ID:	Run ID: <b>ICP7500_080227A</b>				SeqNo: <b>1335572</b>	Prep Date: <b>2/22/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	U	5.0								

<b>LCS</b>	Sample ID: <b>MLCSS1-022208</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/27/08 12:53</b>		
Client ID:	Run ID: <b>ICP7500_080227A</b>				SeqNo: <b>1335573</b>	Prep Date: <b>2/22/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	47.04	5.0	50	0	94.1	80-120	0			

<b>MS</b>	Sample ID: <b>0802300-05EMS</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/27/08 13:28</b>		
Client ID:	Run ID: <b>ICP7500_080227A</b>				SeqNo: <b>1335584</b>	Prep Date: <b>2/22/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	45.29	4.7	47.17	4.044	87.4	80-120	0			

<b>MSD</b>	Sample ID: <b>0802300-05EMSD</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/27/08 13:32</b>		
Client ID:	Run ID: <b>ICP7500_080227A</b>				SeqNo: <b>1335585</b>	Prep Date: <b>2/22/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	46.21	4.7	47.17	4.044	89.4	80-120	45.29	2	25	

<b>DUP</b>	Sample ID: <b>0802300-05EDUP</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/27/08 13:25</b>		
Client ID:	Run ID: <b>ICP7500_080227A</b>				SeqNo: <b>1335583</b>	Prep Date: <b>2/22/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	U	4.7	0	0	0		4.044	0		

The following samples were analyzed in this batch:

0802318-01D	0802318-02E	0802318-03D
0802318-04D		

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

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E - Value above quantitation range

QC Page: 14 of 35

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

# QC BATCH REPORT

Batch ID: **28372** Instrument ID **Mercury** Method: **SW7471A**

<b>MBLK</b>	Sample ID: <b>GBLKS1-022508</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/25/08 14:58</b>		
Client ID:	Run ID: <b>MERCURY_080225A</b>				SeqNo: <b>1334001</b>	Prep Date: <b>2/25/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	U	13								
<b>LCS</b>	Sample ID: <b>GLCSS1-022508</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/25/08 15:00</b>		
Client ID:	Run ID: <b>MERCURY_080225A</b>				SeqNo: <b>1334002</b>	Prep Date: <b>2/25/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	347.3	13	333.3	0	104	85-115	0			
<b>LCSD</b>	Sample ID: <b>GLCSDS1-022508</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/25/08 15:02</b>		
Client ID:	Run ID: <b>MERCURY_080225A</b>				SeqNo: <b>1334003</b>	Prep Date: <b>2/25/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	344.7	13	333.3	0	103	85-115	347.3	0.771	20	
<b>MS</b>	Sample ID: <b>0802300-01CMS</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/25/08 15:16</b>		
Client ID:	Run ID: <b>MERCURY_080225A</b>				SeqNo: <b>1334006</b>	Prep Date: <b>2/25/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	329.9	13	330.6	9.451	96.9	85-115	0			
<b>MSD</b>	Sample ID: <b>0802300-01CMSD</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/25/08 15:18</b>		
Client ID:	Run ID: <b>MERCURY_080225A</b>				SeqNo: <b>1334007</b>	Prep Date: <b>2/25/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	335.1	13	331.1	9.451	98.3	85-115	329.9	1.56	20	
<b>DUP</b>	Sample ID: <b>0802300-01CDUP</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/25/08 15:14</b>		
Client ID:	Run ID: <b>MERCURY_080225A</b>				SeqNo: <b>1334005</b>	Prep Date: <b>2/25/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	9.455	13	0	0	0		9.451	0	20	J

The following samples were analyzed in this batch:

0802318-01C	0802318-02D	0802318-03C
0802318-04C		

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P - Dual Column results percent difference > 40%  
B - Analyte detected in assoc. Method Blank  
U - Analyzed for but not detected  
E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

# QC BATCH REPORT

Batch ID: **28295** Instrument ID **SV-4** Method: **SW8270**

**MBLK** Sample ID: **SBLKS1-080219** Units: **µg/Kg** Analysis Date: **02/20/08 16:31**  
 Client ID: Run ID: **SV-4\_080220A** SeqNo: **1332654** Prep Date: **2/19/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	U	6.6								
2,4,5-Trichlorophenol	U	6.6								
2,4,6-Trichlorophenol	U	6.6								
2,4-Dichlorophenol	U	6.6								
2,4-Dimethylphenol	U	6.6								
2,4-Dinitrophenol	U	33								
2,4-Dinitrotoluene	U	6.6								
2,6-Dinitrotoluene	U	6.6								
2-Chloronaphthalene	U	6.6								
2-Chlorophenol	U	6.6								
2-Methylnaphthalene	U	6.6								
2-Methylphenol	U	6.6								
2-Nitroaniline	U	6.6								
2-Nitrophenol	U	6.6								
3&4-Methylphenol	U	6.6								
3,3'-Dichlorobenzidine	U	6.6								
3-Nitroaniline	U	6.6								
4,6-Dinitro-2-methylphenol	U	6.6								
4-Bromophenyl phenyl ether	U	6.6								
4-Chloro-3-methylphenol	U	6.6								
4-Chloroaniline	U	6.6								
4-Chlorophenyl phenyl ether	U	6.6								
4-Nitroaniline	U	6.6								
4-Nitrophenol	U	33								
Acenaphthene	U	6.6								
Acenaphthylene	U	6.6								
Acetophenone	U	6.6								
Anthracene	U	6.6								
Atrazine	U	6.6								
Benz(a)anthracene	U	6.6								
Benzaldehyde	U	6.6								
Benzo(a)pyrene	U	6.6								
Benzo(b)fluoranthene	U	6.6								
Benzo(g,h,i)perylene	U	6.6								
Benzo(k)fluoranthene	U	6.6								
Bis(2-chloroethoxy)methane	U	6.6								
Bis(2-chloroethyl)ether	U	6.6								
Bis(2-chloroisopropyl)ether	U	6.6								
Bis(2-ethylhexyl)phthalate	U	6.6								
Butyl benzyl phthalate	U	6.6								

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 O - Referenced analyte value is > 4 times amount spiked P - Dual Column results percent difference > 40% E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: <b>28295</b>		Instrument ID <b>SV-4</b>		Method: <b>SW8270</b>				
Caprolactam	U	6.6						
Carbazole	U	6.6						
Chrysene	U	6.6						
Di-n-butyl phthalate	U	6.6						
Di-n-octyl phthalate	U	6.6						
Dibenz(a,h)anthracene	U	6.6						
Dibenzofuran	U	6.6						
Diethyl phthalate	U	6.6						
Dimethyl phthalate	U	6.6						
Fluoranthene	U	6.6						
Fluorene	U	6.6						
Hexachlorobenzene	U	6.6						
Hexachlorobutadiene	U	6.6						
Hexachlorocyclopentadiene	U	6.6						
Hexachloroethane	U	6.6						
Indeno(1,2,3-cd)pyrene	U	6.6						
Isophorone	U	6.6						
N-Nitrosodi-n-propylamine	U	6.6						
N-Nitrosodiphenylamine	U	6.6						
Naphthalene	U	6.6						
Nitrobenzene	U	6.6						
Pentachlorophenol	U	6.6						
Phenanthrene	U	6.6						
Phenol	U	6.6						
Pyrene	U	6.6						
<i>Surr: 2,4,6-Tribromophenol</i>	<i>145.8</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>87.5</i>	<i>36-126</i>	<i>0</i>	
<i>Surr: 2-Fluorobiphenyl</i>	<i>147.9</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>88.7</i>	<i>43-125</i>	<i>0</i>	
<i>Surr: 2-Fluorophenol</i>	<i>160.6</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>96.4</i>	<i>37-125</i>	<i>0</i>	
<i>Surr: 4-Terphenyl-d14</i>	<i>160.6</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>96.4</i>	<i>32-125</i>	<i>0</i>	
<i>Surr: Nitrobenzene-d5</i>	<i>135.8</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>81.5</i>	<i>37-125</i>	<i>0</i>	
<i>Surr: Phenol-d6</i>	<i>150.7</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>90.4</i>	<i>40-125</i>	<i>0</i>	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 17 of 35

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

# QC BATCH REPORT

Batch ID: **28295** Instrument ID **SV-4** Method: **SW8270**

LCS		Sample ID: <b>SLCSS1-080219</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/20/08 16:53</b>		
Client ID:		Run ID: <b>SV-4_080220A</b>				SeqNo: <b>1332655</b>		Prep Date: <b>2/19/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	135.4	6.6	166.7	0	81.2	40-140	0			
2,4,5-Trichlorophenol	156.4	6.6	166.7	0	93.8	40-140	0			
2,4,6-Trichlorophenol	153.1	6.6	166.7	0	91.9	40-140	0			
2,4-Dichlorophenol	141.8	6.6	166.7	0	85.1	40-140	0			
2,4-Dimethylphenol	163.9	6.6	166.7	0	98.3	40-140	0			
2,4-Dinitrophenol	124.6	33	166.7	0	74.7	40-140	0			
2,4-Dinitrotoluene	150.5	6.6	166.7	0	90.3	40-140	0			
2,6-Dinitrotoluene	154	6.6	166.7	0	92.4	40-140	0			
2-Chloronaphthalene	173.7	6.6	166.7	0	104	40-140	0			
2-Chlorophenol	151.9	6.6	166.7	0	91.1	40-140	0			
2-Methylnaphthalene	142.6	6.6	166.7	0	85.6	43-116	0			
2-Methylphenol	144.9	6.6	166.7	0	86.9	41-115	0			
2-Nitroaniline	140.6	6.6	166.7	0	84.4	40-140	0			
2-Nitrophenol	147.3	6.6	166.7	0	88.4	40-140	0			
3&4-Methylphenol	146.6	6.6	166.7	0	88	40-140	0			
3,3'-Dichlorobenzidine	118.4	6.6	166.7	0	71	40-140	0			
3-Nitroaniline	128.5	6.6	166.7	0	77.1	40-140	0			
4,6-Dinitro-2-methylphenol	140.7	6.6	166.7	0	84.4	40-140	0			
4-Bromophenyl phenyl ether	144.6	6.6	166.7	0	86.8	52-115	0			
4-Chloro-3-methylphenol	159.6	6.6	166.7	0	95.7	40-140	0			
4-Chloroaniline	98.47	6.6	166.7	0	59.1	40-140	0			
4-Chlorophenyl phenyl ether	146.8	6.6	166.7	0	88.1	49-115	0			
4-Nitroaniline	143.5	6.6	166.7	0	86.1	40-140	0			
4-Nitrophenol	159.5	33	166.7	0	95.7	40-140	0			
Acenaphthene	139.3	6.6	166.7	0	83.6	51-115	0			
Acenaphthylene	133.3	6.6	166.7	0	80	51-115	0			
Acetophenone	145.9	6.6	166.7	0	87.6	40-140	0			
Anthracene	142.3	6.6	166.7	0	85.4	55-115	0			
Atrazine	158.4	6.6	166.7	0	95	40-140	0			
Benz(a)anthracene	166.8	6.6	166.7	0	100	48-118	0			
Benzaldehyde	114.6	6.6	166.7	0	68.8	40-140	0			
Benzo(a)pyrene	162.1	6.6	166.7	0	97.3	46-120	0			
Benzo(b)fluoranthene	179.3	6.6	166.7	0	108	42-120	0			
Benzo(g,h,i)perylene	152.9	6.6	166.7	0	91.7	37-132	0			
Benzo(k)fluoranthene	170.5	6.6	166.7	0	102	36-131	0			
Bis(2-chloroethoxy)methane	142.5	6.6	166.7	0	85.5	40-140	0			
Bis(2-chloroethyl)ether	105	6.6	166.7	0	63	40-140	0			
Bis(2-chloroisopropyl)ether	138.7	6.6	166.7	0	83.2	40-140	0			
Bis(2-ethylhexyl)phthalate	159.4	6.6	166.7	0	95.6	38-145	0			
Butyl benzyl phthalate	155.9	6.6	166.7	0	93.5	40-140	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

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S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: <b>28295</b>		Instrument ID <b>SV-4</b>		Method: <b>SW8270</b>			
Caprolactam	132.3	6.6	166.7	0	79.4	40-140	0
Carbazole	151.2	6.6	166.7	0	90.7	35-137	0
Chrysene	165.7	6.6	166.7	0	99.4	52-118	0
Di-n-butyl phthalate	151.8	6.6	166.7	0	91.1	40-140	0
Di-n-octyl phthalate	149.7	6.6	166.7	0	89.8	40-140	0
Dibenz(a,h)anthracene	158.6	6.6	166.7	0	95.2	35-133	0
Dibenzofuran	146.8	6.6	166.7	0	88.1	55-115	0
Diethyl phthalate	131.7	6.6	166.7	0	79	40-140	0
Dimethyl phthalate	139.7	6.6	166.7	0	83.8	40-140	0
Fluoranthene	151.2	6.6	166.7	0	90.7	55-117	0
Fluorene	140	6.6	166.7	0	84	52-115	0
Hexachlorobenzene	144.2	6.6	166.7	0	86.5	49-115	0
Hexachlorobutadiene	148.7	6.6	166.7	0	89.2	40-140	0
Hexachlorocyclopentadiene	141.1	6.6	166.7	0	84.6	40-140	0
Hexachloroethane	122.6	6.6	166.7	0	73.6	40-140	0
Indeno(1,2,3-cd)pyrene	154.6	6.6	166.7	0	92.7	35-133	0
Isophorone	132	6.6	166.7	0	79.2	40-140	0
N-Nitrosodi-n-propylamine	141	6.6	166.7	0	84.6	40-140	0
N-Nitrosodiphenylamine	145.4	6.6	166.7	0	87.2	40-140	0
Naphthalene	142.1	6.6	166.7	0	85.3	50-115	0
Nitrobenzene	131.3	6.6	166.7	0	78.8	40-140	0
Pentachlorophenol	166.5	6.6	166.7	0	99.9	20-145	0
Phenanthrene	145.2	6.6	166.7	0	87.1	51-115	0
Phenol	146.2	6.6	166.7	0	87.7	10-110	0
Pyrene	152.9	6.6	166.7	0	91.7	52-115	0
<i>Surr: 2,4,6-Tribromophenol</i>	<i>134.6</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>80.8</i>	<i>36-126</i>	<i>0</i>
<i>Surr: 2-Fluorobiphenyl</i>	<i>137.4</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>82.5</i>	<i>43-125</i>	<i>0</i>
<i>Surr: 2-Fluorophenol</i>	<i>137.9</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>82.7</i>	<i>37-125</i>	<i>0</i>
<i>Surr: 4-Terphenyl-d14</i>	<i>162.1</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>97.3</i>	<i>32-125</i>	<i>0</i>
<i>Surr: Nitrobenzene-d5</i>	<i>138.1</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>82.8</i>	<i>37-125</i>	<i>0</i>
<i>Surr: Phenol-d6</i>	<i>150.7</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>90.4</i>	<i>40-125</i>	<i>0</i>

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

# QC BATCH REPORT

Batch ID: **28295** Instrument ID **SV-4** Method: **SW8270**

MS				Sample ID: <b>0802300-03CMS</b>			Units: <b>µg/Kg</b>		Analysis Date: <b>02/21/08 14:58</b>	
Client ID:				Run ID: <b>SV-4_080220A</b>			SeqNo: <b>1332659</b>		Prep Date: <b>2/19/2008</b>	
									DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	136.4	6.6	166.4	0	81.9	40-140	0			
2,4,5-Trichlorophenol	148.6	6.6	166.4	0	89.3	40-140	0			
2,4,6-Trichlorophenol	146.8	6.6	166.4	0	88.2	40-140	0			
2,4-Dichlorophenol	148.1	6.6	166.4	0	89	40-140	0			
2,4-Dimethylphenol	142.5	6.6	166.4	0	85.7	40-140	0			
2,4-Dinitrophenol	72.52	33	166.4	0	43.6	40-140	0			
2,4-Dinitrotoluene	148.3	6.6	166.4	0	89.1	40-140	0			
2,6-Dinitrotoluene	157.6	6.6	166.4	0	94.7	40-140	0			
2-Chloronaphthalene	166.9	6.6	166.4	0	100	40-140	0			
2-Chlorophenol	160.6	6.6	166.4	0	96.5	40-140	0			
2-Methylnaphthalene	145.7	6.6	166.4	0	87.5	43-116	0			
2-Methylphenol	139.9	6.6	166.4	0	84.1	41-115	0			
2-Nitroaniline	126.6	6.6	166.4	0	76.1	40-140	0			
2-Nitrophenol	139.9	6.6	166.4	0	84.1	40-140	0			
3&4-Methylphenol	149.5	6.6	166.4	0	89.8	40-140	0			
3,3'-Dichlorobenzidine	125.2	6.6	166.4	0	75.2	40-140	0			
3-Nitroaniline	118.6	6.6	166.4	0	71.3	40-140	0			
4,6-Dinitro-2-methylphenol	81.11	6.6	166.4	0	48.7	40-140	0			
4-Bromophenyl phenyl ether	137.6	6.6	166.4	0	82.7	52-115	0			
4-Chloro-3-methylphenol	162.3	6.6	166.4	0	97.5	40-140	0			
4-Chloroaniline	101.8	6.6	166.4	0	61.2	40-140	0			
4-Chlorophenyl phenyl ether	149.3	6.6	166.4	0	89.7	49-115	0			
4-Nitroaniline	130.4	6.6	166.4	0	78.4	40-140	0			
4-Nitrophenol	169.5	33	166.4	0	102	40-140	0			
Acenaphthene	140.9	6.6	166.4	0	84.7	51-115	0			
Acenaphthylene	131.8	6.6	166.4	0	79.2	51-115	0			
Acetophenone	145.1	6.6	166.4	0	87.2	40-140	0			
Anthracene	139.9	6.6	166.4	0	84.1	55-115	0			
Atrazine	159	6.6	166.4	0	95.5	40-140	0			
Benz(a)anthracene	173.6	6.6	166.4	0	104	48-118	0			
Benzaldehyde	121.7	6.6	166.4	0	73.1	40-140	0			
Benzo(a)pyrene	171.1	6.6	166.4	0	103	46-120	0			
Benzo(b)fluoranthene	169.9	6.6	166.4	0	102	42-120	0			
Benzo(g,h,i)perylene	158.7	6.6	166.4	0	95.4	37-132	0			
Benzo(k)fluoranthene	157.3	6.6	166.4	0	94.6	36-131	0			
Bis(2-chloroethoxy)methane	140.8	6.6	166.4	0	84.6	40-140	0			
Bis(2-chloroethyl)ether	126.7	6.6	166.4	0	76.1	40-140	0			
Bis(2-chloroisopropyl)ether	122	6.6	166.4	0	73.3	40-140	0			
Bis(2-ethylhexyl)phthalate	180.4	6.6	166.4	14.18	99.9	38-145	0			
Butyl benzyl phthalate	178.2	6.6	166.4	0	107	40-140	0			

ND - Not Detected at the Reporting Limit

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R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: <b>28295</b>	Instrument ID <b>SV-4</b>		Method: <b>SW8270</b>				
Caprolactam	179.2	6.6	166.4	24.84	92.8	40-140	0
Carbazole	148.5	6.6	166.4	0	89.2	35-137	0
Chrysene	165.7	6.6	166.4	0	99.6	52-118	0
Di-n-butyl phthalate	152.1	6.6	166.4	10.79	84.9	40-140	0
Di-n-octyl phthalate	169.9	6.6	166.4	0	102	40-140	0
Dibenz(a,h)anthracene	165.7	6.6	166.4	0	99.6	35-133	0
Dibenzofuran	137.7	6.6	166.4	0	82.8	55-115	0
Diethyl phthalate	135.9	6.6	166.4	0	81.6	40-140	0
Dimethyl phthalate	146.5	6.6	166.4	0	88.1	40-140	0
Fluoranthene	143.7	6.6	166.4	0	86.4	55-117	0
Fluorene	137.6	6.6	166.4	0	82.7	52-115	0
Hexachlorobenzene	136.5	6.6	166.4	0	82	49-115	0
Hexachlorobutadiene	139.5	6.6	166.4	0	83.8	40-140	0
Hexachlorocyclopentadiene	76.72	6.6	166.4	0	46.1	40-140	0
Hexachloroethane	113.4	6.6	166.4	0	68.2	40-140	0
Indeno(1,2,3-cd)pyrene	159.3	6.6	166.4	0	95.7	35-133	0
Isophorone	136	6.6	166.4	0	81.7	40-140	0
N-Nitrosodi-n-propylamine	134.9	6.6	166.4	0	81.1	40-140	0
N-Nitrosodiphenylamine	149.6	6.6	166.4	0	89.9	40-140	0
Naphthalene	133.2	6.6	166.4	0	80	50-115	0
Nitrobenzene	126.7	6.6	166.4	0	76.2	40-140	0
Pentachlorophenol	149.6	6.6	166.4	0	89.9	20-145	0
Phenanthrene	144.4	6.6	166.4	0	86.8	51-115	0
Phenol	149.6	6.6	166.4	0	89.9	10-110	0
Pyrene	167.9	6.6	166.4	0	101	52-115	0
<i>Surr: 2,4,6-Tribromophenol</i>	<i>118.9</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>71.4</i>	<i>36-126</i>	<i>0</i>
<i>Surr: 2-Fluorobiphenyl</i>	<i>130.9</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>78.7</i>	<i>43-125</i>	<i>0</i>
<i>Surr: 2-Fluorophenol</i>	<i>134.2</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>80.6</i>	<i>37-125</i>	<i>0</i>
<i>Surr: 4-Terphenyl-d14</i>	<i>171.5</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>103</i>	<i>32-125</i>	<i>0</i>
<i>Surr: Nitrobenzene-d5</i>	<i>135.5</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>81.5</i>	<i>37-125</i>	<i>0</i>
<i>Surr: Phenol-d6</i>	<i>145.3</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>87.3</i>	<i>40-125</i>	<i>0</i>

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R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

# QC BATCH REPORT

Batch ID: **28295** Instrument ID **SV-4** Method: **SW8270**

MSD		Sample ID: <b>0802300-03CMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/21/08 15:19</b>		
Client ID:		Run ID: <b>SV-4_080220A</b>				SeqNo: <b>1332661</b>		Prep Date: <b>2/19/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	139.9	6.6	166.6	0	84	40-140	136.4	2.53	30	
2,4,5-Trichlorophenol	147.8	6.6	166.6	0	88.8	40-140	148.6	0.49	30	
2,4,6-Trichlorophenol	152	6.6	166.6	0	91.2	40-140	146.8	3.48	30	
2,4-Dichlorophenol	149.5	6.6	166.6	0	89.8	40-140	148.1	0.947	30	
2,4-Dimethylphenol	141.6	6.6	166.6	0	85	40-140	142.5	0.654	30	
2,4-Dinitrophenol	95.3	33	166.6	0	57.2	40-140	72.52	27.1	30	
2,4-Dinitrotoluene	146	6.6	166.6	0	87.7	40-140	148.3	1.54	30	
2,6-Dinitrotoluene	156.1	6.6	166.6	0	93.7	40-140	157.6	0.961	30	
2-Chloronaphthalene	167.2	6.6	166.6	0	100	40-140	166.9	0.171	30	
2-Chlorophenol	151.7	6.6	166.6	0	91.1	40-140	160.6	5.67	30	
2-Methylnaphthalene	139	6.6	166.6	0	83.5	43-116	145.7	4.68	30	
2-Methylphenol	141.7	6.6	166.6	0	85.1	41-115	139.9	1.26	30	
2-Nitroaniline	139.5	6.6	166.6	0	83.7	40-140	126.6	9.65	30	
2-Nitrophenol	137.3	6.6	166.6	0	82.4	40-140	139.9	1.87	30	
3&4-Methylphenol	153.6	6.6	166.6	0	92.2	40-140	149.5	2.7	30	
3,3'-Dichlorobenzidine	122.9	6.6	166.6	0	73.8	40-140	125.2	1.89	30	
3-Nitroaniline	124.7	6.6	166.6	0	74.9	40-140	118.6	5.01	30	
4,6-Dinitro-2-methylphenol	95.28	6.6	166.6	0	57.2	40-140	81.11	16.1	30	
4-Bromophenyl phenyl ether	138.8	6.6	166.6	0	83.4	52-115	137.6	0.907	30	
4-Chloro-3-methylphenol	164.6	6.6	166.6	0	98.8	40-140	162.3	1.41	30	
4-Chloroaniline	96.86	6.6	166.6	0	58.2	40-140	101.8	5.02	30	
4-Chlorophenyl phenyl ether	154.6	6.6	166.6	0	92.8	49-115	149.3	3.46	30	
4-Nitroaniline	140.1	6.6	166.6	0	84.1	40-140	130.4	7.13	30	
4-Nitrophenol	156.8	33	166.6	0	94.1	40-140	169.5	7.76	30	
Acenaphthene	145.1	6.6	166.6	0	87.1	51-115	140.9	2.99	30	
Acenaphthylene	134.7	6.6	166.6	0	80.8	51-115	131.8	2.17	30	
Acetophenone	134.5	6.6	166.6	0	80.7	40-140	145.1	7.61	30	
Anthracene	126.5	6.6	166.6	0	75.9	55-115	139.9	10.1	30	
Atrazine	155.6	6.6	166.6	0	93.4	40-140	159	2.14	30	
Benz(a)anthracene	158	6.6	166.6	0	94.9	48-118	173.6	9.44	30	
Benzaldehyde	119.6	6.6	166.6	0	71.8	40-140	121.7	1.7	30	
Benzo(a)pyrene	171.2	6.6	166.6	0	103	46-120	171.1	0.0272	30	
Benzo(b)fluoranthene	176.9	6.6	166.6	0	106	42-120	169.9	4.03	30	
Benzo(g,h,i)perylene	156.7	6.6	166.6	0	94.1	37-132	158.7	1.3	30	
Benzo(k)fluoranthene	161.9	6.6	166.6	0	97.2	36-131	157.3	2.88	30	
Bis(2-chloroethoxy)methane	132.8	6.6	166.6	0	79.8	40-140	140.8	5.84	30	
Bis(2-chloroethyl)ether	126	6.6	166.6	0	75.6	40-140	126.7	0.586	30	
Bis(2-chloroisopropyl)ether	121.9	6.6	166.6	0	73.2	40-140	122	0.0951	30	
Bis(2-ethylhexyl)phthalate	178.4	6.6	166.6	14.18	98.6	38-145	180.4	1.11	30	
Butyl benzyl phthalate	161	6.6	166.6	0	96.6	40-140	178.2	10.2	30	

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U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: <b>28295</b>		Instrument ID <b>SV-4</b>		Method: <b>SW8270</b>					
Caprolactam	208	6.6	166.6	24.84	110	40-140	179.2	14.9	30
Carbazole	143.5	6.6	166.6	0	86.1	35-137	148.5	3.44	30
Chrysene	155.1	6.6	166.6	0	93.1	52-118	165.7	6.62	30
Di-n-butyl phthalate	152.9	6.6	166.6	10.79	85.3	40-140	152.1	0.479	30
Di-n-octyl phthalate	180.5	6.6	166.6	0	108	40-140	169.9	6.04	30
Dibenz(a,h)anthracene	160.5	6.6	166.6	0	96.4	35-133	165.7	3.14	30
Dibenzofuran	145.5	6.6	166.6	0	87.4	55-115	137.7	5.52	30
Diethyl phthalate	145.1	6.6	166.6	0	87.1	40-140	135.9	6.57	30
Dimethyl phthalate	149.2	6.6	166.6	0	89.6	40-140	146.5	1.85	30
Fluoranthene	140.9	6.6	166.6	0	84.6	55-117	143.7	1.94	30
Fluorene	145	6.6	166.6	0	87	52-115	137.6	5.24	30
Hexachlorobenzene	135.8	6.6	166.6	0	81.5	49-115	136.5	0.506	30
Hexachlorobutadiene	128.8	6.6	166.6	0	77.3	40-140	139.5	7.99	30
Hexachlorocyclopentadiene	81.01	6.6	166.6	0	48.6	40-140	76.72	5.45	30
Hexachloroethane	121.1	6.6	166.6	0	72.7	40-140	113.4	6.53	30
Indeno(1,2,3-cd)pyrene	167.1	6.6	166.6	0	100	35-133	159.3	4.78	30
Isophorone	128.4	6.6	166.6	0	77.1	40-140	136	5.7	30
N-Nitrosodi-n-propylamine	139.2	6.6	166.6	0	83.6	40-140	134.9	3.13	30
N-Nitrosodiphenylamine	149.2	6.6	166.6	0	89.6	40-140	149.6	0.315	30
Naphthalene	130.2	6.6	166.6	0	78.2	50-115	133.2	2.25	30
Nitrobenzene	131.5	6.6	166.6	0	78.9	40-140	126.7	3.65	30
Pentachlorophenol	106.2	6.6	166.6	0	63.7	20-145	149.6	34	30 R
Phenanthrene	154.6	6.6	166.6	0	92.8	51-115	144.4	6.8	30
Phenol	153.3	6.6	166.6	0	92	10-110	149.6	2.43	30
Pyrene	152.2	6.6	166.6	0	91.4	52-115	167.9	9.81	30
<i>Surr: 2,4,6-Tribromophenol</i>	131.3	6.6	166.6	0	78.8	36-126	118.9	9.95	30
<i>Surr: 2-Fluorobiphenyl</i>	135.3	6.6	166.6	0	81.2	43-125	130.9	3.32	30
<i>Surr: 2-Fluorophenol</i>	136.2	6.6	166.6	0	81.8	37-125	134.2	1.49	30
<i>Surr: 4-Terphenyl-d14</i>	160.5	6.6	166.6	0	96.4	32-125	171.5	6.62	30
<i>Surr: Nitrobenzene-d5</i>	120.4	6.6	166.6	0	72.3	37-125	135.5	11.8	30
<i>Surr: Phenol-d6</i>	145.7	6.6	166.6	0	87.4	40-125	145.3	0.235	30

The following samples were analyzed in this batch:

0802318-02C	0802318-03C	0802318-04C
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**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

# QC BATCH REPORT

Batch ID: **R60280** Instrument ID **VOA3** Method: **SW8260**

**MBLK** Sample ID: **VBLKS-022508** Units: **µg/Kg** Analysis Date: **02/25/08 13:48**

Client ID: Run ID: **VOA3\_080225A** SeqNo: **1334671** Prep Date: DF: 1

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	U	5.0								
1,1,2,2-Tetrachloroethane	U	5.0								
1,1,2-Trichlor-1,2,2-trifluoroethane	U	5.0								
1,1,2-Trichloroethane	U	5.0								
1,1-Dichloroethane	U	5.0								
1,1-Dichloroethene	U	5.0								
1,2,4-Trichlorobenzene	U	5.0								
1,2-Dibromo-3-chloropropane	U	5.0								
1,2-Dibromoethane	U	5.0								
1,2-Dichlorobenzene	U	5.0								
1,2-Dichloroethane	U	5.0								
1,2-Dichloropropane	U	5.0								
1,3-Dichlorobenzene	U	5.0								
1,4-Dichlorobenzene	U	5.0								
2-Butanone	U	10								
2-Hexanone	U	10								
4-Methyl-2-pentanone	U	10								
Acetone	U	20								
Benzene	U	5.0								
Bromodichloromethane	U	5.0								
Bromoform	U	5.0								
Bromomethane	U	10								
Carbon disulfide	U	10								
Carbon tetrachloride	U	5.0								
Chlorobenzene	U	5.0								
Chloroethane	U	10								
Chloroform	U	5.0								
Chloromethane	U	10								
cis-1,2-Dichloroethene	U	5.0								
cis-1,3-Dichloropropene	U	5.0								
Cyclohexane	U	5.0								
Dibromochloromethane	U	5.0								
Dichlorodifluoromethane	U	5.0								
Ethylbenzene	U	5.0								
Isopropylbenzene	U	5.0								
Methyl acetate	U	5.0								
Methyl tert-butyl ether	U	5.0								
Methylcyclohexane	U	5.0								
Styrene	U	5.0								
Tetrachloroethene	U	5.0								

ND - Not Detected at the Reporting Limit S - Spike Recovery outside accepted recovery limits B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits R - RPD outside accepted recovery limits U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked P - Dual Column results percent difference > 40% E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: <b>R60280</b>		Instrument ID <b>VOA3</b>		Method: <b>SW8260</b>				
Toluene	U	5.0						
trans-1,2-Dichloroethene	U	5.0						
trans-1,3-Dichloropropene	U	5.0						
Trichloroethene	U	5.0						
Trichlorofluoromethane	U	5.0						
Vinyl chloride	U	2.0						
Xylenes, Total	U	15						
<i>Surr: 1,2-Dichloroethane-d4</i>	<i>53.37</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>107</i>	<i>70-128</i>	<i>0</i>	
<i>Surr: 4-Bromofluorobenzene</i>	<i>54.52</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>109</i>	<i>73-126</i>	<i>0</i>	
<i>Surr: Dibromofluoromethane</i>	<i>52.99</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>106</i>	<i>71-128</i>	<i>0</i>	
<i>Surr: Toluene-d8</i>	<i>53.78</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>108</i>	<i>73-127</i>	<i>0</i>	

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QC Page: 25 of 35

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

# QC BATCH REPORT

Batch ID: **R60280** Instrument ID **VOA3** Method: **SW8260**

LCS		Sample ID: <b>VLCSS-022508</b>		Units: <b>µg/Kg</b>			Analysis Date: <b>02/25/08 12:53</b>			
Client ID:		Run ID: <b>VOA3_080225A</b>		SeqNo: <b>1334670</b>		Prep Date:		DF: 1		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	50.93	5.0	50	0	102	79-124	0			
1,1,2,2-Tetrachloroethane	49.74	5.0	50	0	99.5	75-123	0			
1,1,2-Trichlor-1,2,2-trifluoroethane	53.62	5.0	50	0	107	79-125	0			
1,1,2-Trichloroethane	48.11	5.0	50	0	96.2	79-120	0			
1,1-Dichloroethane	49.4	5.0	50	0	98.8	75-124	0			
1,1-Dichloroethene	53.02	5.0	50	0	106	80-122	0			
1,2,4-Trichlorobenzene	49.77	5.0	50	0	99.5	74-128	0			
1,2-Dibromo-3-chloropropane	46.69	5.0	50	0	93.4	66-129	0			
1,2-Dibromoethane	47.1	5.0	50	0	94.2	79-120	0			
1,2-Dichlorobenzene	48.35	5.0	50	0	96.7	79-120	0			
1,2-Dichloroethane	48.42	5.0	50	0	96.8	73-121	0			
1,2-Dichloropropane	49.09	5.0	50	0	98.2	76-120	0			
1,3-Dichlorobenzene	49.85	5.0	50	0	99.7	79-120	0			
1,4-Dichlorobenzene	49.95	5.0	50	0	99.9	77-120	0			
2-Butanone	91.37	10	100	0	91.4	65-130	0			
2-Hexanone	93.93	10	100	0	93.9	65-133	0			
4-Methyl-2-pentanone	91	10	100	0	91	69-130	0			
Acetone	94.56	20	100	0	94.6	53-142	0			
Benzene	48.88	5.0	50	0	97.8	79-120	0			
Bromodichloromethane	49.43	5.0	50	0	98.9	79-121	0			
Bromoform	47.48	5.0	50	0	95	74-122	0			
Bromomethane	45.86	10	50	0	91.7	68-131	0			
Carbon disulfide	101.9	10	100	0	102	80-124	0			
Carbon tetrachloride	49.39	5.0	50	0	98.8	74-126	0			
Chlorobenzene	47.66	5.0	50	0	95.3	79-120	0			
Chloroethane	52.96	10	50	0	106	76-126	0			
Chloroform	49.76	5.0	50	0	99.5	78-120	0			
Chloromethane	47.7	10	50	0	95.4	69-129	0			
cis-1,2-Dichloroethene	49.4	5.0	50	0	98.8	80-120	0			
cis-1,3-Dichloropropene	49.65	5.0	50	0	99.3	77-123	0			
Cyclohexane	54.83	5.0	50	0	110	74-126	0			
Dibromochloromethane	47.89	5.0	50	0	95.8	78-122	0			
Dichlorodifluoromethane	51.1	5.0	50	0	102	57-140	0			
Ethylbenzene	48.54	5.0	50	0	97.1	80-122	0			
Isopropylbenzene	49.87	5.0	50	0	99.7	72-127	0			
Methyl acetate	45.32	5.0	50	0	90.6	69-123	0			
Methyl tert-butyl ether	47.18	5.0	50	0	94.4	76-121	0			
Methylcyclohexane	53.78	5.0	50	0	108	77-126	0			
Styrene	50.78	5.0	50	0	102	78-124	0			
Tetrachloroethene	50.61	5.0	50	0	101	80-121	0			

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E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: <b>R60280</b>		Instrument ID <b>VOA3</b>		Method: <b>SW8260</b>			
Toluene	48.64	5.0	50	0	97.3	79-120	0
trans-1,2-Dichloroethene	50.59	5.0	50	0	101	79-122	0
trans-1,3-Dichloropropene	49.2	5.0	50	0	98.4	77-120	0
Trichloroethene	48.42	5.0	50	0	96.8	80-121	0
Trichlorofluoromethane	53.31	5.0	50	0	107	75-126	0
Vinyl chloride	53.24	2.0	50	0	106	76-126	0
Xylenes, Total	148.2	15	150	0	98.8	80-120	0
<i>Surr: 1,2-Dichloroethane-d4</i>	46.91	0	50	0	93.8	70-128	0
<i>Surr: 4-Bromofluorobenzene</i>	47.46	0	50	0	94.9	73-126	0
<i>Surr: Dibromofluoromethane</i>	46.64	0	50	0	93.3	71-128	0
<i>Surr: Toluene-d8</i>	46	0	50	0	92	73-127	0

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QC Page: 27 of 35



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

# QC BATCH REPORT

Batch ID: **R60280** Instrument ID **VOA3** Method: **SW8260**

MS		Sample ID: <b>0802304-01BMS</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/25/08 15:09</b>		
Client ID:		Run ID: <b>VOA3_080225A</b>				SeqNo: <b>1334673</b>		Prep Date:		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	46.12	5.0	50	0	92.2	79-124	0			
1,1,2,2-Tetrachloroethane	44.29	5.0	50	0	88.6	75-123	0			
1,1,2-Trichlor-1,2,2-trifluoroethane	48.62	5.0	50	0	97.2	79-125	0			
1,1,2-Trichloroethane	45.93	5.0	50	0	91.9	79-120	0			
1,1-Dichloroethane	44.06	5.0	50	0	88.1	75-124	0			
1,1-Dichloroethene	48.08	5.0	50	0	96.2	80-122	0			
1,2,4-Trichlorobenzene	41.4	5.0	50	0	82.8	74-128	0			
1,2-Dibromo-3-chloropropane	46.65	5.0	50	0	93.3	66-129	0			
1,2-Dibromoethane	46.23	5.0	50	0	92.5	79-120	0			
1,2-Dichlorobenzene	41.85	5.0	50	0	83.7	79-120	0			
1,2-Dichloroethane	45.21	5.0	50	0	90.4	73-121	0			
1,2-Dichloropropane	45.05	5.0	50	0	90.1	76-120	0			
1,3-Dichlorobenzene	42.83	5.0	50	0	85.7	79-120	0			
1,4-Dichlorobenzene	42.58	5.0	50	0	85.2	77-120	0			
2-Butanone	91.1	10	100	0	91.1	65-130	0			
2-Hexanone	97.38	10	100	0	97.4	65-133	0			
4-Methyl-2-pentanone	94.47	10	100	0	94.5	69-130	0			
Acetone	103.9	20	100	0	104	53-142	0			
Benzene	45.62	5.0	50	0	91.2	79-120	0			
Bromodichloromethane	45.62	5.0	50	0	91.2	79-121	0			
Bromoform	46.87	5.0	50	0	93.7	74-122	0			
Bromomethane	41.67	10	50	0	83.3	68-131	0			
Carbon disulfide	91.63	10	100	0	91.6	80-124	0			
Carbon tetrachloride	48.57	5.0	50	0	97.1	74-126	0			
Chlorobenzene	44.07	5.0	50	0	88.1	79-120	0			
Chloroethane	47.31	10	50	0	94.6	76-126	0			
Chloroform	44.42	5.0	50	0	88.8	78-120	0			
Chloromethane	42.97	10	50	0	85.9	69-129	0			
cis-1,2-Dichloroethene	44.08	5.0	50	0	88.2	80-120	0			
cis-1,3-Dichloropropene	46.26	5.0	50	0	92.5	77-123	0			
Cyclohexane	48.26	5.0	50	0	96.5	74-126	0			
Dibromochloromethane	45.18	5.0	50	0	90.4	78-122	0			
Dichlorodifluoromethane	48.54	5.0	50	0	97.1	57-140	0			
Ethylbenzene	45.79	5.0	50	0	91.6	80-122	0			
Isopropylbenzene	46.46	5.0	50	0	92.9	72-127	0			
Methyl acetate	41.16	5.0	50	0	82.3	69-123	0			
Methyl tert-butyl ether	43.2	5.0	50	0	86.4	76-121	0			
Methylcyclohexane	46.31	5.0	50	0	92.6	77-126	0			
Styrene	45.68	5.0	50	0	91.4	78-124	0			
Tetrachloroethene	47.64	5.0	50	0	95.3	80-121	0			

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**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: <b>R60280</b>		Instrument ID <b>VOA3</b>		Method: <b>SW8260</b>			
Toluene	44.63	5.0	50	0	89.3	79-120	0
trans-1,2-Dichloroethene	45.68	5.0	50	0	91.4	79-122	0
trans-1,3-Dichloropropene	45.99	5.0	50	0	92	77-120	0
Trichloroethene	47.82	5.0	50	0	95.6	80-121	0
Trichlorofluoromethane	48.21	5.0	50	0	96.4	75-126	0
Vinyl chloride	49.19	2.0	50	0	98.4	76-126	0
Xylenes, Total	137.4	15	150	0	91.6	80-120	0
<i>Surr: 1,2-Dichloroethane-d4</i>	<i>49.47</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>98.9</i>	<i>70-128</i>	<i>0</i>
<i>Surr: 4-Bromofluorobenzene</i>	<i>51.19</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>102</i>	<i>73-126</i>	<i>0</i>
<i>Surr: Dibromofluoromethane</i>	<i>47.9</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>95.8</i>	<i>71-128</i>	<i>0</i>
<i>Surr: Toluene-d8</i>	<i>49.39</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>98.8</i>	<i>73-127</i>	<i>0</i>

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 29 of 35

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

# QC BATCH REPORT

Batch ID: **R60280** Instrument ID **VOA3** Method: **SW8260**

MSD		Sample ID: <b>0802304-01BMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/25/08 18:46</b>		
Client ID:		Run ID: <b>VOA3_080225A</b>				SeqNo: <b>1334674</b>		Prep Date:		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	53	5.0	50	0	106	79-124	46.12	13.9	30	
1,1,2,2-Tetrachloroethane	51.12	5.0	50	0	102	75-123	44.29	14.3	30	
1,1,2-Trichlor-1,2,2-trifluoroethane	56.09	5.0	50	0	112	79-125	48.62	14.3	30	
1,1,2-Trichloroethane	51.48	5.0	50	0	103	79-120	45.93	11.4	30	
1,1-Dichloroethane	52.34	5.0	50	0	105	75-124	44.06	17.2	30	
1,1-Dichloroethene	56.56	5.0	50	0	113	80-122	48.08	16.2	30	
1,2,4-Trichlorobenzene	46.78	5.0	50	0	93.6	74-128	41.4	12.2	30	
1,2-Dibromo-3-chloropropane	50.09	5.0	50	0	100	66-129	46.65	7.1	30	
1,2-Dibromoethane	50.1	5.0	50	0	100	79-120	46.23	8.04	30	
1,2-Dichlorobenzene	48	5.0	50	0	96	79-120	41.85	13.7	30	
1,2-Dichloroethane	53.18	5.0	50	0	106	73-121	45.21	16.2	30	
1,2-Dichloropropane	53.18	5.0	50	0	106	76-120	45.05	16.5	30	
1,3-Dichlorobenzene	49.42	5.0	50	0	98.8	79-120	42.83	14.3	30	
1,4-Dichlorobenzene	48.61	5.0	50	0	97.2	77-120	42.58	13.2	30	
2-Butanone	99.88	10	100	0	99.9	65-130	91.1	9.19	30	
2-Hexanone	102.5	10	100	0	103	65-133	97.38	5.14	30	
4-Methyl-2-pentanone	99.71	10	100	0	99.7	69-130	94.47	5.39	30	
Acetone	118.7	20	100	0	119	53-142	103.9	13.3	30	
Benzene	53.75	5.0	50	0	108	79-120	45.62	16.4	30	
Bromodichloromethane	52.91	5.0	50	0	106	79-121	45.62	14.8	30	
Bromoform	50.76	5.0	50	0	102	74-122	46.87	7.97	30	
Bromomethane	49.84	10	50	0	99.7	68-131	41.67	17.9	30	
Carbon disulfide	109.9	10	100	0	110	80-124	91.63	18.1	30	
Carbon tetrachloride	55.5	5.0	50	0	111	74-126	48.57	13.3	30	
Chlorobenzene	50.11	5.0	50	0	100	79-120	44.07	12.8	30	
Chloroethane	55.15	10	50	0	110	76-126	47.31	15.3	30	
Chloroform	52.57	5.0	50	0	105	78-120	44.42	16.8	30	
Chloromethane	50.26	10	50	0	101	69-129	42.97	15.6	30	
cis-1,2-Dichloroethene	49.72	5.0	50	0	99.4	80-120	44.08	12	30	
cis-1,3-Dichloropropene	52.89	5.0	50	0	106	77-123	46.26	13.4	30	
Cyclohexane	55.62	5.0	50	0	111	74-126	48.26	14.2	30	
Dibromochloromethane	49.5	5.0	50	0	99	78-122	45.18	9.14	30	
Dichlorodifluoromethane	57.01	5.0	50	0	114	57-140	48.54	16	30	
Ethylbenzene	51.21	5.0	50	0	102	80-122	45.79	11.2	30	
Isopropylbenzene	51.12	5.0	50	0	102	72-127	46.46	9.57	30	
Methyl acetate	45.84	5.0	50	0	91.7	69-123	41.16	10.8	30	
Methyl tert-butyl ether	50.31	5.0	50	0	101	76-121	43.2	15.2	30	
Methylcyclohexane	53.42	5.0	50	0	107	77-126	46.31	14.3	30	
Styrene	51.31	5.0	50	0	103	78-124	45.68	11.6	30	
Tetrachloroethene	53.81	5.0	50	0	108	80-121	47.64	12.2	30	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: <b>R60280</b>		Instrument ID <b>VOA3</b>		Method: <b>SW8260</b>						
Toluene	51.44	5.0	50	0	103	79-120	44.63	14.2	30	
trans-1,2-Dichloroethene	53.22	5.0	50	0	106	79-122	45.68	15.3	30	
trans-1,3-Dichloropropene	53.13	5.0	50	0	106	77-120	45.99	14.4	30	
Trichloroethene	54.95	5.0	50	0	110	80-121	47.82	13.9	30	
Trichlorofluoromethane	55.76	5.0	50	0	112	75-126	48.21	14.5	30	
Vinyl chloride	56.23	2.0	50	0	112	76-126	49.19	13.4	30	
Xylenes, Total	155.1	15	150	0	103	80-120	137.4	12.2	30	
<i>Surr: 1,2-Dichloroethane-d4</i>	50.62	0	50	0	101	70-128	49.47	2.3	30	
<i>Surr: 4-Bromofluorobenzene</i>	48.93	0	50	0	97.9	73-126	51.19	4.51	30	
<i>Surr: Dibromofluoromethane</i>	49.11	0	50	0	98.2	71-128	47.9	2.5	30	
<i>Surr: Toluene-d8</i>	48.96	0	50	0	97.9	73-127	49.39	0.864	30	

The following samples were analyzed in this batch:

0802318-01B	0802318-02B	0802318-03B
0802318-04B		

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 31 of 35

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: **R60093** Instrument ID **Balance1** Method: **E160.3**

<b>DUP</b>	Sample ID: <b>0802318-04CDUP</b>				Units: <b>wt%</b>			Analysis Date: <b>02/19/08 12:00</b>		
Client ID: <b>F14-SB-6(113-115)</b>			Run ID: <b>BALANCE1_080219B</b>		SeqNo: <b>1330957</b>		Prep Date:		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Percent Moisture	8.126	0.010	0	0	0	0-0	8.382	3.1	20	

<b>DUP</b>	Sample ID: <b>0802346-04ADUP</b>				Units: <b>wt%</b>			Analysis Date: <b>02/19/08 12:00</b>		
Client ID:			Run ID: <b>BALANCE1_080219B</b>		SeqNo: <b>1330961</b>		Prep Date:		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Percent Moisture	37.21	0.010	0	0	0	0-0	37.56	0.935	20	

The following samples were analyzed in this batch:

0802318-01C	0802318-02C	0802318-03C
0802318-04C		

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 32 of 35

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: **R60110** Instrument ID **UV-2450** Method: **E365.3** **(Dissolve)**

MBLK	Sample ID: WBLKW1-022008				Units: mg/Kg			Analysis Date: 02/20/08 10:00		
Client ID:	Run ID: UV-2450_080220A				SeqNo: 1331161		Prep Date:		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Phosphorus, Dissolved (As P)	U	0.13								
Phosphorus, Total (As P)	U	0.50								
Phosphorus, Total Orthophosphate	U	0.13								

LCS	Sample ID: <b>WLCSW1-022008</b>					Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 10:00</b>		
Client ID:	Run ID: <b>UV-2450_080220A</b>				SeqNo: <b>1331162</b>		Prep Date:		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Phosphorus, Total (As P)	13	0.50	12.5	0	104	80-120	0			

MS	Sample ID: 0802300-01CMS					Units: mg/Kg		Analysis Date: 02/20/08 10:00		
Client ID:	Run ID: UV-2450_080220A				SeqNo: 1331180		Prep Date:		DF: 5	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Phosphorus, Total (As P)	114.5	2.5	12.5	88.75	206	80-120	0			SO

DUP	Sample ID: 0802300-01CDUP					Units: mg/Kg		Analysis Date: 02/20/08 10:00		
Client ID:	Run ID: UV-2450_080220A				SeqNo: 1331179		Prep Date:		DF: 5	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Phosphorus, Dissolved (As P)	U	0.65	0	0	0	0-0	0	0	20	
Phosphorus, Total (As P)	86.75	2.5	0	0	0	0-0	88.75	2.28	20	
Phosphorus, Total Orthophosphate	U	0.65	0	0	0	0-0	0	0	20	

The following samples were analyzed in this batch:

0802318-01C	0802318-02C	0802318-03C
0802318-04C		

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

## QC BATCH REPORT

Batch ID: **R60205** Instrument ID **UV-2450** Method: **SW9014**

<b>MBLK</b>	Sample ID: <b>WBLKW1-022208</b>			Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 12:00</b>			
Client ID:	Run ID: <b>UV-2450_080222E</b>			SeqNo: <b>1333091</b>			Prep Date:		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	U	2.0								
Cyanide, Amenable to Chlorination	U	2.0								

<b>LCS</b>	Sample ID: <b>WLCSW1-022208</b>			Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 12:00</b>			
Client ID:	Run ID: <b>UV-2450_080222E</b>			SeqNo: <b>1333092</b>			Prep Date:		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	9.7	2.0	10	0	97	80-120	0			

<b>MS</b>	Sample ID: <b>0802304-01CMS</b>			Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 12:00</b>			
Client ID:	Run ID: <b>UV-2450_080222E</b>			SeqNo: <b>1333109</b>			Prep Date:		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	9.2	2.0	10	0.1	91	75-125	0			

<b>DUP</b>	Sample ID: <b>0802304-01CDDU</b>			Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 12:00</b>			
Client ID:	Run ID: <b>UV-2450_080222E</b>			SeqNo: <b>1333108</b>			Prep Date:		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	U	2.0	0	0	0	0-0	0.1	0	20	
Cyanide, Amenable to Chlorination	U	2.0	0	0	0	0-0	0	0	0	

The following samples were analyzed in this batch:

0802318-01C	0802318-02C	0802318-03C
0802318-04C		

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802318  
**Project:** Oro Grande LF- Deep Borings

# QC BATCH REPORT

Batch ID: **R60293** Instrument ID **UV-2450** Method: **SM4500-SiD**

<b>MBLK</b>	Sample ID: <b>WBLKS1-022608</b>				Units: <b>mg/kg</b>			Analysis Date: <b>02/26/08 11:45</b>		
Client ID:	Run ID: <b>UV-2450_080226C</b>				SeqNo: <b>1334919</b>		Prep Date:		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Silica, Dissolved (as SiO2)	U	0.10								

<b>LCS</b>	Sample ID: <b>WLCSS1-022608</b>				Units: <b>mg/kg</b>			Analysis Date: <b>02/26/08 11:45</b>		
Client ID:	Run ID: <b>UV-2450_080226C</b>				SeqNo: <b>1334920</b>		Prep Date:		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Silica, Dissolved (as SiO2)	5.14	0.10	5	0	103	80-120	0			

<b>MS</b>	Sample ID: <b>0802300-01CMS</b>				Units: <b>mg/kg</b>			Analysis Date: <b>02/26/08 11:45</b>		
Client ID:	Run ID: <b>UV-2450_080226C</b>				SeqNo: <b>1334942</b>		Prep Date:		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Silica, Dissolved (as SiO2)	20.28	0.10	5	16.31	79.4	80-120	0			SE

<b>DUP</b>	Sample ID: <b>0802300-01CDUP</b>				Units: <b>mg/kg</b>			Analysis Date: <b>02/26/08 11:45</b>		
Client ID:	Run ID: <b>UV-2450_080226C</b>				SeqNo: <b>1334941</b>		Prep Date:		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Silica, Dissolved (as SiO2)	15.98	0.10	0	0	0		16.31	2.04		

The following samples were analyzed in this batch:

0802318-01C	0802318-02D	0802318-03C
0802318-04C		

ND - Not Detected at the Reporting Limit  
J - Analyte detected below quantitation limits  
O - Referenced analyte value is > 4 times amount spiked  
S - Spike Recovery outside accepted recovery limits  
R - RPD outside accepted recovery limits  
P - Dual Column results percent difference > 40%  
B - Analyte detected in assoc. Method Blank  
U - Analyzed for but not detected  
E - Value above quantitation range



FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802304

Instrument ID: VOA3

Calibration Date(s): 02/22/08 02/22/08

Column: DB624

ID: 0.18 (mm)

Calibration Time(s): 1839

2313

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R <sup>2</sup>
		A0	A1	A2	
Dichlorodifluoromethane	AVRG		0.22529496		13.7
Chloromethane	AVRG		0.50395004		6.4
Vinyl Chloride	AVRG		0.38061303		12.8
Bromomethane	AVRG		0.47034754		6.3
Chloroethane	AVRG		0.25590152		13.3
Trichlorofluoromethane	AVRG		0.52093848		11.4
Acetone	2ORDR	-0.1030328	7.69742006	-0.4850961	1.000
1,1-Dichloroethene	AVRG		0.44134287		11.8
Methylene Chloride	2ORDR	-2.67e-002	2.12273658	-8.33e-002	1.000
Carbon Disulfide	AVRG		1.23232143		8.2
trans-1,2-Dichloroethene	AVRG		0.52949026		7.2
1,1-Dichloroethane	AVRG		0.62436785		6.0
2-Butanone	AVRG		0.27355813		4.7
cis-1,2-Dichloroethene	AVRG		0.56688104		6.0
Chloroform	AVRG		0.64832752		4.1
1,1,1-Trichloroethane	AVRG		0.56575531		8.3
1,2-Dichloroethane	AVRG		0.21292786		6.0
Carbon Tetrachloride	AVRG		0.31001095		11.5
Benzene	AVRG		0.98477378		5.4
Trichloroethene	AVRG		0.37385412		9.0
Bromodichloromethane	AVRG		0.30312539		7.3
1,2-Dichloropropane	AVRG		0.21848339		6.6
4-Methyl-2-Pentanone	AVRG		0.41051773		6.9
cis-1,3-Dichloropropene	AVRG		0.35972479		6.2
Toluene	AVRG		1.34768016		5.9
trans-1,3-Dichloropropene	AVRG		0.28056964		5.9
2-Hexanone	AVRG		0.27008591		5.0
1,1,2-Trichloroethane	AVRG		0.21712708		4.3
Dibromochloromethane	AVRG		0.35828242		7.5
Tetrachloroethene	AVRG		0.32100523		10.8
1,2-Dibromoethane	AVRG		0.34318420		6.2
Chlorobenzene	AVRG		1.07891045		6.5
Ethylbenzene	AVRG		0.53165863		8.6
m,p-Xylenes	AVRG		0.67727071		8.0
o-Xylene	AVRG		0.64914349		8.2
Styrene	AVRG		1.13325264		8.9
Bromoform	AVRG		0.25184687		8.7

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802304

Instrument ID: VOA3

Calibration Date(s): 02/22/08 02/22/08

Column: DB624

ID: 0.18 (mm)

Calibration Time(s): 1839

2313

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R <sup>2</sup>
		A0	A1	A2	
Isopropylbenzene	AVRG		1.42085798		9.5
1,1,2,2-Tetrachloroethane	AVRG		0.67886333		4.0
1,3-Dichlorobenzene	AVRG		1.60773650		6.6
1,4-Dichlorobenzene	AVRG		1.63839256		5.9
1,2-Dichlorobenzene	AVRG		1.53650202		5.9
1,2-Dibromo-3-Chloropropane	AVRG		0.14824980		9.3
1,2,4-Trichlorobenzene	AVRG		0.99308149		9.6
Methyl tert-butyl ether	AVRG		1.01876955		4.3
Methylcyclohexane	AVRG		0.71459521		14.9
Cyclohexane	AVRG		0.69216911		14.6
Freon TF	AVRG		0.48314480		13.6
Methyl Acetate	AVRG		0.84402848		6.4
Dibromofluoromethane	AVRG		0.53239644		1.8
1,2-Dichloroethane-d4	AVRG		0.27529825		3.4
Toluene-d8	AVRG		1.25374927		2.1
4-Bromofluorobenzene	AVRG		0.45418738		3.2

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802304

Instrument ID: VOA3

Calibration Date(s): 02/22/08 02/22/08

Column: DB624

ID: 0.18 (mm)

Calibration Time(s): 1839

2313

LAB FILE ID:

RF2.5: G022203

RF5: G022204

RF10: G022205

RF20: G022206

RF50: G022213

COMPOUND	RF2.5	RF5	RF10	RF20	RF50
Dichlorodifluoromethane		0.196	0.190	0.194	0.262
Chloromethane	0.539	0.551	0.477	0.473	0.528
Vinyl Chloride	0.325	0.332	0.332	0.356	0.431
Bromomethane	0.523	0.492	0.441	0.431	0.482
Chloroethane	0.194	0.237	0.230	0.256	0.282
Trichlorofluoromethane	0.458	0.471	0.466	0.470	0.590
Acetone	0.246	0.212	0.167	0.154	0.134
1,1-Dichloroethene	0.401	0.398	0.371	0.404	0.500
Methylene Chloride	0.674	0.592	0.501	0.516	0.514
Carbon Disulfide	1.202	1.158	1.092	1.122	1.318
trans-1,2-Dichloroethene	0.500	0.512	0.472	0.509	0.576
1,1-Dichloroethane	0.635	0.612	0.548	0.606	0.660
2-Butanone	0.293	0.284	0.267	0.281	0.256
cis-1,2-Dichloroethene	0.539	0.570	0.502	0.568	0.584
Chloroform	0.641	0.657	0.594	0.661	0.686
1,1,1-Trichloroethane	0.551	0.560	0.489	0.510	0.616
1,2-Dichloroethane	0.192	0.218	0.196	0.220	0.227
Carbon Tetrachloride	0.289	0.298	0.276	0.262	0.366
Benzene	0.950	0.987	0.894	0.962	1.067
Trichloroethene	0.380	0.354	0.323	0.347	0.432
Bromodichloromethane	0.274	0.295	0.272	0.310	0.330
1,2-Dichloropropane	0.192	0.222	0.205	0.220	0.237
4-Methyl-2-Pentanone	0.435	0.456	0.398	0.430	0.399
cis-1,3-Dichloropropene	0.342	0.351	0.323	0.366	0.391
Toluene	1.419	1.326	1.243	1.287	1.494
trans-1,3-Dichloropropene	0.260	0.277	0.255	0.293	0.302
2-Hexanone	0.252	0.284	0.260	0.283	0.276
1,1,2-Trichloroethane	0.209	0.223	0.208	0.224	0.232
Dibromochloromethane	0.333	0.351	0.319	0.362	0.398
Tetrachloroethene	0.319	0.304	0.288	0.277	0.388
1,2-Dibromoethane	0.328	0.341	0.315	0.357	0.374
Chlorobenzene	1.118	1.053	0.978	1.057	1.210
Ethylbenzene	0.567	0.506	0.473	0.484	0.609
m,p-Xylenes	0.678	0.643	0.613	0.637	0.786
o-Xylene	0.663	0.600	0.588	0.615	0.748
Styrene	1.068	1.032	1.023	1.110	1.322
Bromoform	0.230	0.248	0.230	0.248	0.288

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802304

Instrument ID: VOA3

Calibration Date(s): 02/22/08 02/22/08

Column: DB624

ID: 0.18 (mm)

Calibration Time(s): 1839

2313

LAB FILE ID:

RF2.5: G022203

RF5: G022204

RF10: G022205

RF20: G022206

RF50: G022213

COMPOUND	RF2.5	RF5	RF10	RF20	RF50
Isopropylbenzene	1.432	1.295	1.266	1.303	1.668
1,1,2,2-Tetrachloroethane	0.654	0.713	0.666	0.719	0.689
1,3-Dichlorobenzene	1.653	1.545	1.460	1.558	1.812
1,4-Dichlorobenzene	1.676	1.641	1.486	1.600	1.813
1,2-Dichlorobenzene	1.607	1.504	1.422	1.519	1.704
1,2-Dibromo-3-Chloropropane	0.124	0.143	0.144	0.153	0.161
1,2,4-Trichlorobenzene	0.984	0.923	0.878	0.928	1.152
Methyl tert-butyl ether	0.980	1.074	0.956	1.063	1.032
Methylcyclohexane	0.679	0.592	0.604	0.600	0.831
Cyclohexane	0.638	0.577	0.585	0.599	0.785
Freon TF	0.430	0.422	0.420	0.419	0.556
Methyl Acetate	0.943	0.800	0.838	0.879	0.792
Dibromofluoromethane	0.527	0.533	0.532	0.552	0.538
1,2-Dichloroethane-d4	0.279	0.282	0.279	0.281	0.266
Toluene-d8	1.219	1.251	1.246	1.259	1.302
4-Bromofluorobenzene	0.438	0.444	0.450	0.451	0.474

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802304

Instrument ID: VOA3

Calibration Date(s): 02/22/08 02/22/08

Column: DB624

ID: 0.18 (mm)

Calibration Time(s): 1839

2313

LAB FILE ID:

RF100: G022208

RF150: G022209

RF200: G022210

COMPOUND	RF100	RF150	RF200
Dichlorodifluoromethane	0.242	0.253	0.240
Chloromethane	0.482	0.512	0.469
Vinyl Chloride	0.425	0.434	0.409
Bromomethane	0.457	0.478	0.458
Chloroethane	0.286	0.295	0.267
Trichlorofluoromethane	0.571	0.585	0.556
Acetone	0.137	0.142	0.141
1,1-Dichloroethene	0.482	0.496	0.477
Methylene Chloride	0.486	0.507	
Carbon Disulfide	1.310	1.361	1.295
trans-1,2-Dichloroethene	0.535	0.581	0.551
1,1-Dichloroethane	0.628	0.670	0.635
2-Butanone	0.257	0.274	0.276
cis-1,2-Dichloroethene	0.575	0.618	0.579
Chloroform	0.644	0.666	0.638
1,1,1-Trichloroethane	0.592	0.613	0.593
1,2-Dichloroethane	0.210	0.221	0.220
Carbon Tetrachloride	0.318	0.325	0.347
Benzene	0.975	1.022	1.022
Trichloroethene	0.371	0.382	0.402
Bromodichloromethane	0.300	0.320	0.324
1,2-Dichloropropane	0.214	0.228	0.229
4-Methyl-2-Pentanone	0.370	0.385	0.409
cis-1,3-Dichloropropene	0.350	0.377	0.377
Toluene	1.299	1.341	1.373
trans-1,3-Dichloropropene	0.276	0.290	0.292
2-Hexanone	0.256	0.264	0.285
1,1,2-Trichloroethane	0.206	0.215	0.222
Dibromochloromethane	0.346	0.369	0.389
Tetrachloroethene	0.320	0.323	0.348
1,2-Dibromoethane	0.322	0.342	0.366
Chlorobenzene	1.026	1.074	1.115
Ethylbenzene	0.517	0.537	0.560
m,p-Xylenes	0.660	0.684	0.716
o-Xylene	0.627	0.661	0.691
Styrene	1.120	1.179	1.212
Bromoform	0.236	0.252	0.282

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802304

Instrument ID: VOA3 Calibration Date(s): 02/22/08 02/22/08

Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1839 2313

LAB FILE ID: RF100: G022208 RF150: G022209 RF200: G022210

COMPOUND	RF100	RF150	RF200
Isopropylbenzene	1.418	1.451	1.533
1,1,2,2-Tetrachloroethane	0.640	0.670	0.679
1,3-Dichlorobenzene	1.550	1.616	1.666
1,4-Dichlorobenzene	1.561	1.640	1.691
1,2-Dichlorobenzene	1.450	1.507	1.579
1,2-Dibromo-3-Chloropropane	0.141	0.149	0.170
1,2,4-Trichlorobenzene	0.956	1.013	1.110
Methyl tert-butyl ether	0.979	1.052	1.014
Methylcyclohexane	0.788	0.820	0.803
Cyclohexane	0.778	0.809	0.766
Freon TF	0.530	0.556	0.533
Methyl Acetate	0.806	0.887	0.806
Dibromofluoromethane	0.529	0.529	0.519
1,2-Dichloroethane-d4	0.276	0.282	0.256
Toluene-d8	1.238	1.238	1.277
4-Bromofluorobenzene	0.442	0.456	0.478

FORM VI VOA

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802304

Instrument ID: SV4

Calibration Date(s): 02/18/08 02/18/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1456 1707

LAB FILE ID: RF0.2: 04

RF0.5: 05

RF1: 06

RF2.5: 07

RF5: 08

COMPOUND	RF0.2	RF0.5	RF1	RF2.5	RF5
Phenol	1.358	1.374	1.643	1.828	1.689
Bis (2-chloroethyl) ether	1.100	1.631	1.262	1.632	1.469
2-Chlorophenol	1.103	1.102	1.253	1.394	1.436
2-Methylphenol	1.539	1.022	1.138	1.404	1.316
bis (2-Chloroisopropyl) ether	0.946	0.546	0.604	0.737	0.735
3&4-Methylphenol	1.295	1.345	1.391	1.505	1.569
N-Nitroso-di-n-propylamine	1.310	0.803	0.919	0.993	1.032
Hexachloroethane	0.612	0.548	0.552	0.636	0.596
Nitrobenzene	0.343	0.374	0.376	0.383	0.367
Isophorone	0.780	0.575	0.618	0.575	0.580
2-Nitrophenol	0.253	0.186	0.215	0.209	0.207
2,4-Dimethylphenol	0.250	0.309	0.309	0.328	0.349
Bis (2-chloroethoxy) methane	0.518	0.368	0.393	0.404	0.399
2,4-Dichlorophenol	0.253	0.309	0.276	0.288	0.271
Naphthalene	1.121	0.987	1.033	1.052	0.962
4-Chloroaniline	0.452	0.454	0.423	0.462	0.444
Hexachlorobutadiene	0.130	0.137	0.140	0.157	0.158
4-Chloro-3-Methylphenol	0.291	0.263	0.273	0.298	0.300
2-Methylnaphthalene	0.610	0.528	0.572	0.576	0.553
Hexachlorocyclopentadiene	0.420	0.354	0.407	0.390	0.364
2,4,6-Trichlorophenol	0.348	0.389	0.441	0.392	0.395
2,4,5-Trichlorophenol	0.366	0.333	0.410	0.477	0.388
2-Chloronaphthalene	1.174	1.018	1.119	1.273	1.120
2-Nitroaniline	0.363	0.392	0.379	0.381	0.388
Dimethylphthalate	1.244	1.436	1.492	1.412	1.280
Acenaphthylene	2.084	2.247	2.194	2.087	1.800
2,6-Dinitrotoluene	0.328	0.254	0.371	0.393	0.337
3-Nitroaniline	0.467	0.409	0.430	0.401	0.410
Acenaphthene	1.095	1.210	1.236	1.257	1.123
2,4-Dinitrophenol	0.195	0.170	0.206	0.241	0.234
Dibenzofuran	1.785	1.644	1.693	1.709	1.519
4-Nitrophenol	0.233	0.128	0.214	0.215	0.207
2,4-Dinitrotoluene	0.414	0.402	0.502	0.490	0.423
Diethylphthalate	1.707	1.447	1.572	1.570	1.360
4-Chlorophenyl phenyl ether	0.559	0.594	0.564	0.613	0.626
Fluorene	1.431	1.446	1.442	1.457	1.336
4-Nitroaniline	0.447	0.349	0.326	0.449	0.394

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802304

Instrument ID: SV4

Calibration Date(s): 02/18/08 02/18/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1456 1707

LAB FILE ID: RF0.2: 04

RF0.5: 05

RF1: 06

RF2.5: 07

RF5: 08

COMPOUND	RF0.2	RF0.5	RF1	RF2.5	RF5
4,6-Dinitro-2-methylphenol	0.292	0.158	0.201	0.218	0.214
N-Nitrosodiphenylamine	1.043	0.964	0.894	0.970	0.895
4-Bromophenyl-phenylether	0.370	0.197	0.266	0.306	0.285
Hexachlorobenzene	0.355	0.298	0.301	0.315	0.330
Pentachlorophenol	0.170	0.137	0.171	0.194	0.196
Phenanthrene	1.362	1.212	1.134	1.160	1.021
Anthracene	1.337	1.157	1.157	1.207	1.024
Carbazole	1.203	0.937	1.045	1.131	0.972
Di-n-butylphthalate	1.667	1.340	1.393	1.559	1.333
Fluoranthene	1.200	0.962	1.021	1.101	0.984
Pyrene	1.340	1.466	1.226	1.340	1.270
Butylbenzylphthalate	0.722	0.815	0.777	0.805	0.810
Benzo(a)Anthracene	1.148	1.143	1.063	1.237	1.172
3,3'-Dichlorobenzidine	0.463	0.495	0.400	0.506	0.478
bis(2-ethylhexyl)phthalate	1.184	1.239	1.006	1.096	1.155
Chrysene	1.060	1.130	1.198	1.195	1.152
Di-n-octylphthalate	1.796	1.721	1.782	1.900	1.832
Benzo(b)fluoranthene	1.031	0.992	1.167	1.242	1.142
Benzo(k)fluoranthene	1.086	1.251	1.162	1.254	1.197
Benzo(a)pyrene	1.058	0.948	1.071	1.116	1.056
Indeno(1,2,3-cd)pyrene	0.929	0.902	0.937	1.049	1.005
Dibenzo(a,h)anthracene	0.881	0.972	0.972	1.110	1.049
Benzo(g,h,i)perylene	0.989	1.035	1.037	1.163	1.092
Acetophenone	0.465	0.485	0.477	0.472	0.487
Caprolactam	0.119	0.132	0.124	0.132	0.123
1,1'-Biphenyl	1.480	1.515	1.700	1.612	1.460
Benzaldehyde	1.174	0.902	0.927	1.051	1.090
Atrazine	0.260	0.256	0.306	0.301	0.284
Phenol-d6	1.333	1.477	1.456	1.737	1.799
2-Fluorophenol	1.344	1.098	1.114	1.115	1.334
Nitrobenzene-d5	0.384	0.350	0.397	0.353	0.383
2-Fluorobiphenyl	1.320	1.335	1.536	1.490	1.313
2,4,6-Tribromophenol	0.237	0.167	0.217	0.211	0.194
4-Terphenyl-d14	0.856	0.766	0.759	0.899	0.892

FORM VI SV



FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802304

Instrument ID: SV4

Calibration Date(s): 02/18/08 02/18/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1456 1707

LAB FILE ID: RF7.5: 09

RF10: 10

COMPOUND	RF7.5	RF10	CURVE	COEFFICIENT A1	%RSD OR R^2
Phenol	1.477	1.496	AVRG	1.55237249	11.2
Bis(2-chloroethyl)ether	1.490	1.467	AVRG	1.43577916	13.5
2-Chlorophenol	1.299	1.258	AVRG	1.26349376	10.2
2-Methylphenol	1.230	1.261	AVRG	1.27276875	13.3
bis(2-Chloroisopropyl) ether	0.663	0.664	AVRG	0.69920313	18.4
3&4-Methylphenol	1.420	1.441	AVRG	1.42378532	6.5
N-Nitroso-di-n-propylamine	0.873	0.908	AVRG	0.97702089	16.9
Hexachloroethane	0.535	0.590	AVRG	0.58130953	6.4
Nitrobenzene	0.366	0.342	AVRG	0.36439188	4.4
Isophorone	0.555	0.527	AVRG	0.60137266	13.8
2-Nitrophenol	0.192	0.198	AVRG	0.20840540	10.6
2,4-Dimethylphenol	0.333	0.300	AVRG	0.31135015	10.3
Bis(2-chloroethoxy)methane	0.378	0.359	AVRG	0.40268100	13.2
2,4-Dichlorophenol	0.262	0.247	AVRG	0.27241001	7.9
Naphthalene	0.934	0.802	AVRG	0.98456767	10.3
4-Chloroaniline	0.430	0.398	AVRG	0.43750279	5.0
Hexachlorobutadiene	0.150	0.137	AVRG	0.14414966	7.6
4-Chloro-3-Methylphenol	0.292	0.276	AVRG	0.28473151	4.9
2-Methylnaphthalene	0.538	0.485	AVRG	0.55184946	7.2
Hexachlorocyclopentadiene	0.361	0.348	AVRG	0.37783877	7.4
2,4,6-Trichlorophenol	0.336	0.346	AVRG	0.37841589	9.8
2,4,5-Trichlorophenol	0.381	0.374	AVRG	0.38989390	11.5
2-Chloronaphthalene	1.027	0.975	AVRG	1.10095914	9.4
2-Nitroaniline	0.348	0.337	AVRG	0.36989139	5.6
Dimethylphthalate	1.228	1.105	AVRG	1.31374176	10.4
Acenaphthylene	1.713	1.514	AVRG	1.94842423	14.1
2,6-Dinitrotoluene	0.329	0.321	AVRG	0.33345904	13.1
3-Nitroaniline	0.351	0.373	AVRG	0.40604530	9.3
Acenaphthene	1.055	0.978	AVRG	1.13641941	9.0
2,4-Dinitrophenol	0.220	0.238	AVRG	0.21504048	12.1
Dibenzofuran	1.429	1.301	AVRG	1.58285406	10.9
4-Nitrophenol	0.190	0.196	AVRG	0.19763210	17.1
2,4-Dinitrotoluene	0.433	0.396	AVRG	0.43739851	9.6
Diethylphthalate	1.262	1.172	AVRG	1.44137385	13.2
4-Chlorophenyl phenyl ether	0.552	0.539	AVRG	0.57827942	5.7
Fluorene	1.252	1.166	AVRG	1.36140900	8.4
4-Nitroaniline	0.375	0.371	AVRG	0.38749355	12.1

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802304

Instrument ID: SV4

Calibration Date(s): 02/18/08 02/18/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1456 1707

LAB FILE ID: RF7.5: 09

RF10: 10

COMPOUND	RF7.5	RF10	CURVE	COEFFICIENT A1	%RSD OR R^2
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	0.217	0.205	AVRG	0.21499811	18.4
N-Nitrosodiphenylamine	0.868	0.779	AVRG	0.91594993	9.3
4-Bromophenyl-phenylether	0.284	0.251	AVRG	0.27981927	19.0
Hexachlorobenzene	0.305	0.283	AVRG	0.31252239	7.6
Pentachlorophenol	0.189	0.178	AVRG	0.17641698	11.5
Phenanthrene	1.016	0.886	AVRG	1.11288714	13.9
Anthracene	1.036	0.868	AVRG	1.11228630	13.6
Carbazole	0.956	0.833	AVRG	1.01112107	12.4
Di-n-butylphthalate	1.336	1.088	AVRG	1.38808587	13.3
Fluoranthene	1.021	0.868	AVRG	1.02234608	10.3
Pyrene	1.238	1.084	AVRG	1.28073938	9.3
Butylbenzylphthalate	0.766	0.742	AVRG	0.77666486	4.6
Benzo(a)Anthracene	1.133	1.060	AVRG	1.13655748	5.4
3,3'-Dichlorobenzidine	0.482	0.446	AVRG	0.46697209	7.6
bis(2-ethylhexyl)phthalate	1.066	1.011	AVRG	1.10814417	8.0
Chrysene	1.113	0.977	AVRG	1.11794146	7.0
Di-n-octylphthalate	1.712	1.721	AVRG	1.78058429	3.9
Benzo(b)fluoranthene	1.059	1.143	AVRG	1.11095640	7.8
Benzo(k)fluoranthene	1.179	1.125	AVRG	1.17899987	5.2
Benzo(a)pyrene	1.000	1.030	AVRG	1.03991573	5.2
Indeno(1,2,3-cd)pyrene	0.982	1.018	AVRG	0.97460842	5.5
Dibenzo(a,h)anthracene	0.996	1.064	AVRG	1.00622547	7.5
Benzo(g,h,i)perylene	1.002	1.068	AVRG	1.05510709	5.6
Acetophenone	0.447	0.425	AVRG	0.46543254	4.8
Caprolactam	0.122	0.122	AVRG	0.12481386	4.2
1,1'-Biphenyl	1.346	1.233	AVRG	1.47791741	10.6
Benzaldehyde	0.894	0.947	AVRG	0.99779091	10.8
Atrazine	0.268	0.266	AVRG	0.27738086	7.2
=====	=====	=====	=====	=====	=====
Phenol-d6	1.554	1.571	AVRG	1.56135306	10.4
2-Fluorophenol	1.135	1.097	AVRG	1.17676838	9.5
Nitrobenzene-d5	0.358	0.339	AVRG	0.36624628	5.9
2-Fluorobiphenyl	1.220	1.126	AVRG	1.33424549	10.7
2,4,6-Tribromophenol	0.190	0.191	AVRG	0.20091324	11.3
4-Terphenyl-d14	0.861	0.815	AVRG	0.83562888	6.8

FORM VI SV

FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: Contract:  
Lab Code: Case No.: SAS No.: SDG No.: 0802304  
Instrument ID: SV4 Calibration Date: 02/20/08 Time: 1548  
Lab File ID: 02 Init. Calib. Date(s): 02/18/08 02/18/08  
Init. Calib. Times: 1456 1707  
GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	RRF	RRF2.5	MIN RRF	%D	MAX %D
Phenol	1.552	1.513	0.8	2.5	20.0
Bis(2-chloroethyl) ether	1.436	1.196	0.7	16.7	20.0
2-Chlorophenol	1.264	1.199	0.8	5.1	20.0
2-Methylphenol	1.273	1.265	0.7	0.6	20.0
bis(2-Chloroisopropyl) ether	0.699	0.675	0.01	3.4	20.0
3&4-Methylphenol	1.424	1.292	0.6	9.3	20.0
N-Nitroso-di-n-propylamine	0.977	0.870	0.5	11.0	20.0
Hexachloroethane	0.581	0.535	0.3	7.9	20.0
Nitrobenzene	0.364	0.350	0.2	3.8	20.0
Isophorone	0.601	0.544	0.4	9.5	20.0
2-Nitrophenol	0.208	0.190	0.1	8.6	20.0
2,4-Dimethylphenol	0.311	0.320	0.2	2.9	20.0
Bis(2-chloroethoxy)methane	0.403	0.380	0.3	5.7	20.0
2,4-Dichlorophenol	0.272	0.256	0.2	5.9	20.0
Naphthalene	0.984	0.963	0.7	2.1	20.0
4-Chloroaniline	0.438	0.418	0.01	4.6	20.0
Hexachlorobutadiene	0.144	0.162	0.01	12.5	20.0
4-Chloro-3-Methylphenol	0.285	0.280	0.2	1.8	20.0
2-Methylnaphthalene	0.552	0.520	0.4	5.8	20.0
Hexachlorocyclopentadiene	0.378	0.401	0.05	6.1	20.0
2,4,6-Trichlorophenol	0.378	0.362	0.2	4.2	20.0
2,4,5-Trichlorophenol	0.390	0.415	0.2	6.4	20.0
2-Chloronaphthalene	1.101	1.205	0.8	9.4	20.0
2-Nitroaniline	0.370	0.333	0.01	10.0	20.0
Dimethylphthalate	1.314	1.289	0.01	1.9	20.0
Acenaphthylene	1.948	1.823	0.9	6.4	20.0
2,6-Dinitrotoluene	0.333	0.329	0.2	1.2	20.0
3-Nitroaniline	0.406	0.397	0.01	2.2	20.0
Acenaphthene	1.136	1.107	0.9	2.6	20.0
2,4-Dinitrophenol	0.215	0.199	0.01	7.4	20.0
Dibenzofuran	1.583	1.555	0.8	1.8	20.0
4-Nitrophenol	0.198	0.178	0.01	10.1	20.0
2,4-Dinitrotoluene	0.437	0.389	0.2	11.0	20.0
Diethylphthalate	1.441	1.326	0.01	8.0	20.0
4-Chlorophenyl phenyl ether	0.578	0.590	0.4	2.1	20.0
Fluorene	1.361	1.277	0.9	6.2	20.0
4-Nitroaniline	0.387	0.390	0.01	0.8	20.0

FORM VII SV

FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: Contract:  
Lab Code: Case No.: SAS No.: SDG No.: 0802304  
Instrument ID: SV4 Calibration Date: 02/20/08 Time: 1548  
Lab File ID: 02 Init. Calib. Date(s): 02/18/08 02/18/08  
Init. Calib. Times: 1456 1707  
GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	RRF	RRF2.5	MIN RRF	%D	MAX %D
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	0.215	0.194	0.01	9.8	20.0
N-Nitrosodiphenylamine	0.916	0.880	0.01	3.9	20.0
4-Bromophenyl-phenylether	0.280	0.280	0.01	0.0	20.0
Hexachlorobenzene	0.312	0.273	0.1	12.5	20.0
Pentachlorophenol	0.176	0.174	0.05	1.1	20.0
Phenanthrene	1.113	1.142	0.7	2.6	20.0
Anthracene	1.112	1.109	0.7	0.3	20.0
Carbazole	1.011	0.995	0.01	1.6	20.0
Di-n-butylphthalate	1.388	1.349	0.01	2.8	20.0
Fluoranthene	1.022	1.055	0.6	3.2	20.0
Pyrene	1.280	1.305	0.6	2.0	20.0
Butylbenzylphthalate	0.777	0.742	0.01	4.5	20.0
Benzo(a)Anthracene	1.136	1.166	0.8	2.6	20.0
3,3'-Dichlorobenzidine	0.467	0.492	0.01	5.4	20.0
bis(2-ethylhexyl)phthalate	1.108	1.055	0.01	4.8	20.0
Chrysene	1.118	1.145	0.7	2.4	20.0
Di-n-octylphthalate	1.780	1.663	0.01	6.6	20.0
Benzo(b)fluoranthene	1.111	1.102	0.7	0.8	20.0
Benzo(k)fluoranthene	1.179	1.222	0.7	3.6	20.0
Benzo(a)pyrene	1.040	1.064	0.7	2.3	20.0
Indeno(1,2,3-cd)pyrene	0.974	0.979	0.5	0.5	20.0
Dibenzo(a,h)anthracene	1.006	1.030	0.4	2.4	20.0
Benzo(g,h,i)perylene	1.055	0.988	0.5	6.4	20.0
Acetophenone	0.465	0.457	0.01	1.7	20.0
Caprolactam	0.125	0.115	0.01	8.0	20.0
1,1'-Biphenyl	1.478	1.398	0.01	5.4	20.0
Benzaldehyde	0.998	0.993	0.01	0.5	20.0
Atrazine	0.277	0.276	0.01	0.4	20.0
=====	=====	=====	=====	=====	=====
Phenol-d6	1.561	1.489	0.01	4.6	20.0
2-Fluorophenol	1.177	1.135	0.01	3.6	20.0
Nitrobenzene-d5	0.366	0.313	0.01	14.5	20.0
2-Fluorobiphenyl	1.334	1.325	0.01	0.7	20.0
2,4,6-Tribromophenol	0.201	0.206	0.01	2.5	20.0
4-Terphenyl-d14	0.835	0.916	0.01	9.7	20.0

FORM VII SV

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP ID: 0.53 (mm) Calibration Time(s): 1519 1810

LAB FILE ID:

RF0.005: 006

RF0.01: 007

RF0.02: 008

RF0.04: 009

RF0.06: 010

RF0.08: 011

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
alpha-BHC	4703	9952	20806	49102	76316	112985
gamma-BHC	4917	10317	21430	49512	75715	110507
Heptachlor	1337400.0	1355800.0	1326400.0	1403625.0	1369433.3	1452975.0
Endosulfan I	315400.00	320900.00	310700.00	319900.00	309400.00	322887.50
Dieldrin	1055000.0	1090600.0	1090375.0	1183612.5	1173325.0	1253556.3
Endrin	797400.00	797850.00	802650.00	867850.00	849391.67	916862.50
4,4'-DDD	738000.00	767900.00	801300.00	889762.50	889050.00	961175.00
4,4'-DDT	946100.00	991500.00	1004225.0	1085512.5	1072158.3	1147662.5
Methoxychlor	639420.00	643240.00	623200.00	617895.00	584006.67	604390.00
Tetrachloro-m-xylene	1156200.0	1163100.0	1130500.0	1145300.0	1082450.0	1118837.5
Decachlorobiphenyl	1742300.0	1717600.0	1596650.0	1531712.5	1418600.0	1451331.3

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53 (mm)

Calibration Time(s): 1519

1810

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2	MAX %RSD OR R^2
		A0	A1	A2		
alpha-BHC	2ORDR	1.213e-003	8.968e-007	-1.76e-012	0.9994761	0.9900000
gamma-BHC	2ORDR	9.75e-004	8.859e-007	-1.53e-012	0.9994627	0.9900000
Heptachlor	AVRG		1374272.22		3.424	20.000
Endosulfan I	AVRG		316531.250		1.770	20.000
Dieldrin	AVRG		1141078.13		6.561	20.000
Endrin	AVRG		838667.361		5.780	20.000
4,4'-DDD	AVRG		841197.917		10.179	20.000
4,4'-DDT	AVRG		1041193.06		7.076	20.000
Methoxychlor	AVRG		618691.944		3.586	20.000
Tetrachloro-m-xylene	AVRG		1132731.25		2.606	20.000
Decachlorobiphenyl	AVRG		1576365.63		8.530	20.000

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53

(mm)

Calibration Time(s): 1844

2135

LAB FILE ID:

RF0.005: 012

RF0.01: 013.

RF0.02: 014

RF0.04: 015

RF0.06: 016

RF0.08: 017

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
beta-BHC	779600.00	682900.00	819250.00	774400.00	747550.00	757150.00
delta-BHC	4316	7873	20636	43136	67306	96565
Aldrin	1224000.0	1076600.0	1321850.0	1292725.0	1286950.0	1340325.0
Heptachlor epoxide	1407600.0	1155900.0	1415250.0	1299000.0	1260716.7	1287600.0
gamma-Chlordane	1396800.0	1205000.0	1430100.0	1346200.0	1308966.7	1337712.5
alpha-Chlordane	1371200.0	1193800.0	1412950.0	1339425.0	1321066.7	1346712.5
4,4'-DDE	303600.00	272750.00	343575.00	336837.50	328391.67	334500.00
Endosulfan II	1165100.0	1008900.0	1218525.0	1149975.0	1121858.3	1143275.0
Endrin aldehyde	1103800.0	929950.00	1104450.0	994512.50	953983.33	953756.25
Endosulfan sulfate	1034600.0	890200.00	1056650.0	998475.00	962850.00	988568.75
Endrin ketone	1211700.0	1052500.0	1293750.0	1232637.5	1197025.0	1225406.3

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53 (mm)

Calibration Time(s): 1844

2135

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2	MAX %RSD OR R^2
		A0	A1	A2		
beta-BHC	AVRG		760141.667		5.944	20.000
delta-BHC	2ORDR	1.36e-003	9.701e-007	-1.59e-012	0.9994617	0.9900000
Aldrin	AVRG		1257075.00		7.709	20.000
Heptachlor epoxide	AVRG		1304344.44		7.450	20.000
gamma-Chlordane	AVRG		1337463.19		5.843	20.000
alpha-Chlordane	AVRG		1330859.03		5.580	20.000
4,4'-DDE	AVRG		319942.361		8.412	20.000
Endosulfan II	AVRG		1134605.56		6.138	20.000
Endrin aldehyde	AVRG		1006742.01		7.771	20.000
Endosulfan sulfate	AVRG		988557.292		5.931	20.000
Endrin ketone	AVRG		1202169.79		6.693	20.000

FORM VI PEST



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 10:40  
 Lab File ID: 040.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDB-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
4 beta-BHC	760142	778350	778350	0.010	-2.39539	15.00000	Averaged
5 delta-BHC	0.02000	0.01997	991700	0.010	0.12774	15.00000	Quadratic
7 Aldrin	1257075	1236900	1236900	0.010	1.60492	15.00000	Averaged
8 Heptachlor epoxide	1304344	1335600	1335600	0.010	-2.39627	15.00000	Averaged
9 gamma-Chlordane	1337463	1352350	1352350	0.010	-1.11306	15.00000	Averaged
10 alpha-Chlordane	1330859	1307200	1307200	0.010	1.77773	15.00000	Averaged
12 4,4'-DDE	319942	334425	334425	0.010	-4.52664	15.00000	Averaged
16 Endosulfan II	1134606	1188675	1188675	0.010	-4.76548	15.00000	Averaged
18 Endrin aldehyde	1006742	1101675	1101675	0.010	-9.42972	15.00000	Averaged
19 Endosulfan sulfate	988557	1088675	1088675	0.010	-10.12766	15.00000	Averaged
21 Endrin ketone	1202170	1347550	1347550	0.010	-12.09315	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 11:53  
 Lab File ID: 042.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDA-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
\$ 1 Tetrachloro-m-xylene	1132731	1096050	1096050	0.010	3.23830	15.00000	Averaged
2 alpha-BHC	0.02000	0.01844	999600	0.010	7.80259	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01877	1041650	0.010	6.17493	15.00000	Quadratic
6 Heptachlor	1374272	1291200	1291200	0.010	6.04482	15.00000	Averaged
11 Endosulfan I	316531	298450	298450	0.010	5.71231	15.00000	Averaged
13 Dieldrin	1141078	1056575	1056575	0.010	7.40555	15.00000	Averaged
14 Endrin	838667	911100	911100	0.010	-8.63664	15.00000	Averaged
15 4,4'-DDD	841198	797375	797375	0.010	5.20958	15.00000	Averaged
17 4,4'-DDT	1041193	1025400	1025400	0.010	1.51682	15.00000	Averaged
20 Methoxychlor	618692	670130	670130	0.010	-8.31400	15.00000	Averaged
\$ 25 Decachlorobiphenyl	1576366	1769750	1769750	0.010	-12.26774	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 23:33  
 Lab File ID: 061.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDA-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1 Tetrachloro-m-xylene	1132731	1011800	1011800	0.010	10.67608	15.00000	Averaged
2 alpha-BHC	0.02000	0.01700	913050	0.010	14.98259	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01724	949050	0.010	13.81305	15.00000	Quadratic
6 Heptachlor	1374272	1170350	1170350	0.010	14.83856	15.00000	Averaged
11 Endosulfan I	316531	273550	273550	0.010	13.57883	15.00000	Averaged
13 Dieldrin	1141078	977275	977275	0.010	14.35512	15.00000	Averaged
14 Endrin	838667	786800	786800	0.010	6.18450	15.00000	Averaged
15 4,4'-DDD	841198	728525	728525	0.010	13.39434	15.00000	Averaged
17 4,4'-DDT	1041193	933500	933500	0.010	10.34324	15.00000	Averaged
20 Methoxychlor	618692	617625	617625	0.010	0.17245	15.00000	Averaged
25 Decachlorobiphenyl	1576366	1544975	1544975	0.010	1.99133	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 25-FEB-2008 00:08  
 Lab File ID: 062.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDB-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF %D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
14 beta-BHC	760142	686100	686100	0.010 9.74051	15.00000	Averaged
15 delta-BHC	0.02000	0.01758	860250	0.010 12.10447	15.00000	Quadratic
17 Aldrin	1257075	1096100	1096100	0.010 12.80552	15.00000	Averaged
18 Heptachlor epoxide	1304344	1192150	1192150	0.010 8.60160	15.00000	Averaged
19 gamma-Chlordane	1337463	1207300	1207300	0.010 9.73210	15.00000	Averaged
110 alpha-Chlordane	1330859	1173750	1173750	0.010 11.80508	15.00000	Averaged
112 4,4'-DDE	319942	293825	293825	0.010 8.16315	15.00000	Averaged
116 Endosulfan II	1134606	1058150	1058150	0.010 6.73851	15.00000	Averaged
118 Endrin aldehyde	1006742	973625	973625	0.010 3.28952	15.00000	Averaged
119 Endosulfan sulfate	988557	983800	983800	0.010 0.48124	15.00000	Averaged
121 Endrin ketone	1202170	1203475	1203475	0.010 -0.10857	15.00000	Averaged

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm) Calibration Time(s): 1519 1810

LAB FILE ID: RF0.005: 006 RF0.01: 007 RF0.02: 008  
RF0.04: 009 RF0.06: 010 RF0.08: 011

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
alpha-BHC	4366	9243	19463	45125	68168	96897
gamma-BHC	4659	9791	20206	45154	67093	94014
Heptachlor	1075800.0	1076200.0	1018500.0	1052350.0	1015966.7	1052237.5
Endosulfan I	245600.00	243300.00	238750.00	248175.00	240500.00	248050.00
Dieldrin	818800.00	828900.00	828575.00	875750.00	846383.33	880200.00
Endrin	555400.00	548800.00	540225.00	567687.50	546191.67	573825.00
4,4'-DDD	597000.00	613300.00	621125.00	653725.00	634558.33	659343.75
4,4'-DDT	711300.00	730350.00	717525.00	734662.50	710008.33	736912.50
Methoxychlor	398160.00	380230.00	348445.00	326115.00	300443.33	306826.25
Tetrachloro-m-xylene	975000.00	961700.00	898100.00	877925.00	815966.67	819412.50
Decachlorobiphenyl	1327300.0	1236550.0	1098100.0	991950.00	897141.67	891937.50

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 1519 1810

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2	MAX %RSD OR R^2
		A0	A1	A2		
alpha-BHC	2ORDR	1.336e-003	9.397e-007	-1.31e-012	0.9994175	0.9900000
gamma-BHC	2ORDR	9.163e-004	9.317e-007	-9.41e-013	0.9994792	0.9900000
Heptachlor	AVRG		1048509.03		2.523	20.000
Endosulfan I	AVRG		244062.500		1.604	20.000
Dieldrin	AVRG		846434.722		3.076	20.000
Endrin	AVRG		555354.861		2.346	20.000
4,4'-DDD	AVRG		629842.014		3.818	20.000
4,4'-DDT	AVRG		723459.722		1.656	20.000
Methoxychlor	AVRG		343369.931		11.548	20.000
Tetrachloro-m-xylene	AVRG		891350.694		7.614	20.000
Decachlorobiphenyl	AVRG		1073829.86		16.779	20.000

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm) Calibration Time(s): 1844 2135

LAB FILE ID: RF0.005: 012 RF0.01: 013 RF0.02: 014  
RF0.04: 015 RF0.06: 016 RF0.08: 017

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
beta-BHC	774400.00	656400.00	754850.00	674025.00	631650.00	620262.50
delta-BHC	4184	7319	19399	39861	60746	84295
Aldrin	1011600.0	880600.00	1062900.0	1024875.0	1002283.3	1016825.0
Heptachlor epoxide	1078600.0	918000.00	1049200.0	974875.00	934800.00	937175.00
gamma-Chlordane	1127800.0	960600.00	1088500.0	998250.00	953516.67	954600.00
alpha-Chlordane	1235600.0	969100.00	1133650.0	1007350.0	954050.00	952775.00
4,4'-DDE	235800.00	213600.00	270650.00	260587.50	248450.00	250243.75
Endosulfan II	922100.00	784900.00	919400.00	845975.00	799233.33	793168.75
Endrin aldehyde	870700.00	711700.00	804750.00	698562.50	654216.67	640612.50
Endosulfan sulfate	767700.00	648600.00	758975.00	700837.50	663850.00	668818.75
Endrin ketone	962900.00	792950.00	965100.00	868362.50	818233.33	818743.75

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 1844

2135

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2	MAX %RSD OR R^2
		A0	A1	A2		
beta-BHC	AVRG		685264.583		9.423	20.000
delta-BHC	2ORDR	1.459e-003	1.007e-006	-8.66e-013	0.9993746	0.9900000
Aldrin	AVRG		999847.222		6.206	20.000
Heptachlor epoxide	AVRG		982108.333		6.789	20.000
gamma-Chlordane	AVRG		1013877.78		7.484	20.000
alpha-Chlordane	AVRG		1042087.50		11.198	20.000
4,4'-DDE	AVRG		246555.208		8.104	20.000
Endosulfan II	AVRG		844129.514		7.468	20.000
Endrin aldehyde	AVRG		730090.278		12.318	20.000
Endosulfan sulfate	AVRG		701463.542		7.261	20.000
Endrin ketone	AVRG		871048.264		8.730	20.000

FORM VI PEST



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i      Injection Date: 24-FEB-2008 10:40  
Lab File ID: 040.D      Init. Cal. Date(s): 23-FEB-2008    23-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    15:19      21:35  
Lab Sample ID: INDB-CCV      Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

			CCAL	MIN		MAX	
COMPOUND	RRF / AMOUNT	RF0.020	RRF0.020	RRF	%D / %DRIFT	%D / %DRIFT	CURVE TYPE
4 beta-BHC	685265	712700	712700	0.010	-4.00362	15.00000	Averaged
5 delta-BHC	0.02000	0.01990	930250	0.010	0.50844	15.00000	Quadratic
7 Aldrin	999847	979350	979350	0.010	2.05004	15.00000	Averaged
8 Heptachlor epoxide	982108	1029750	1029750	0.010	-4.85096	15.00000	Averaged
9 gamma-Chlordane	1013878	1023850	1023850	0.010	-0.98357	15.00000	Averaged
10 alpha-Chlordane	1042088	1088450	1088450	0.010	-4.44900	15.00000	Averaged
12 4,4'-DDE	246555	265900	265900	0.010	-7.84603	15.00000	Averaged
16 Endosulfan II	844130	884525	884525	0.010	-4.78546	15.00000	Averaged
18 Endrin aldehyde	730090	791000	791000	0.010	-8.34277	15.00000	Averaged
19 Endosulfan sulfate	701464	771975	771975	0.010	-10.05205	15.00000	Averaged
21 Endrin ketone	871048	976575	976575	0.010	-12.11491	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i      Injection Date: 24-FEB-2008 11:53  
Lab File ID: 042.D      Init. Cal. Date(s): 23-FEB-2008    23-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    15:19      21:35  
Lab Sample ID: INDA-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRFO.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1 Tetrachloro-m-xylene	891351	872000	872000	0.010	2.17094	15.00000	Averaged
2 alpha-BHC	0.02000	0.01861	943650	0.010	6.96596	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01890	984600	0.010	5.50485	15.00000	Quadratic
6 Heptachlor	1048509	1000250	1000250	0.010	4.60263	15.00000	Averaged
11 Endosulfan I	244063	230350	230350	0.010	5.61844	15.00000	Averaged
13 Dieldrin	846435	802350	802350	0.010	5.20828	15.00000	Averaged
14 Endrin	555355	590900	590900	0.010	-6.40044	15.00000	Averaged
15 4,4'-DDD	629842	576525	576525	0.010	8.46514	15.00000	Averaged
17 4,4'-DDT	723460	711200	711200	0.010	1.69460	15.00000	Averaged
20 Methoxychlor	343370	379375	379375	0.010	-10.48580	15.00000	Averaged
25 Decachlorobiphenyl	1073830	1089975	1089975	0.010	-1.50351	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 23:33  
 Lab File ID: 061.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDA-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL	MIN	MAX		CURVE TYPE
			RRFO.020	RRF	%D / %DRIFT	%D / %DRIFT	
\$ 1 Tetrachloro-m-xylene	891351	801200	801200	0.010	10.11394	15.00000	Averaged
2 alpha-BHC	0.02000	0.01702	854950	0.010	14.88483	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01710	884300	0.010	14.49731	15.00000	Quadratic
6 Heptachlor	1048509	896700	896700	0.010	14.47856	15.00000	Averaged
11 Endosulfan I	244063	210950	210950	0.010	13.56722	15.00000	Averaged
13 Dieldrin	846435	730575	730575	0.010	13.68797	15.00000	Averaged
14 Endrin	555355	508725	508725	0.010	8.39641	15.00000	Averaged
15 4,4'-DDD	629842	536175	536175	0.010	14.87151	15.00000	Averaged
17 4,4'-DDT	723460	650150	650150	0.010	10.13321	15.00000	Averaged
20 Methoxychlor	343370	350680	350680	0.010	-2.12892	15.00000	Averaged
\$ 25 Decachlorobiphenyl	1073830	1034425	1034425	0.010	3.66956	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i      Injection Date: 25-FEB-2008 00:08  
Lab File ID: 062.D      Init. Cal. Date(s): 23-FEB-2008    23-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    15:19      21:35  
Lab Sample ID: INDB-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	CCAL		MIN	MAX		CURVE TYPE
		RFO.020	RRFO.020		RRF %D / %DRIFT	%D / %DRIFT	
14 beta-BHC	685265	624300	624300	0.010	8.89650	15.00000	Averaged
15 delta-BHC	0.02000	0.01728	796100	0.010	13.61896	15.00000	Quadratic
17 Aldrin	999847	872300	872300	0.010	12.75667	15.00000	Averaged
18 Heptachlor epoxide	982108	898450	898450	0.010	8.51824	15.00000	Averaged
19 gamma-Chlordane	1013878	904200	904200	0.010	10.81765	15.00000	Averaged
10 alpha-Chlordane	1042088	964100	964100	0.010	7.48378	15.00000	Averaged
12 4,4'-DDE	246555	228975	228975	0.010	7.13033	15.00000	Averaged
16 Endosulfan II	844130	779700	779700	0.010	7.63266	15.00000	Averaged
18 Endrin aldehyde	730090	693550	693550	0.010	5.00490	15.00000	Averaged
19 Endosulfan sulfate	701464	689500	689500	0.010	1.70551	15.00000	Averaged
21 Endrin ketone	871048	865125	865125	0.010	0.68002	15.00000	Averaged

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP

ID: 0.50

(mm)

Calibration Time(s): 1704

2048

LAB FILE ID:

RF0.02: 006

RF0.04: 007

RF0.08: 008

RF0.2: 009

RF0.5: 010

RF0.7: 011

COMPOUND	RF0.02	RF0.04	RF0.08	RF0.2	RF0.5	RF0.7
=====	=====	=====	=====	=====	=====	=====
2,4-DB	5108	9719	18353	41322	87879	118108
Dicamba	12307	22969	42954	95072	203285	268904
Dichlorprop	9154	16682	30960	65694	134828	175040
Dalapon	6745	11203	19791	42458	87260	110919
Dinoseb	5342	11986	42389	58458	126744	188628
MCPA	12002	18958	30045	52002	92400	114748
MCPP	6640	11132	18174	32745	58460	72824
2,4,5-TP (Silvex)	7923	14045	28145	67736	154903	206955
2,4,5-T	7840	14982	30069	70942	158635	210003
2,4-D	10207	18232	33189	70147	141447	183884
=====	=====	=====	=====	=====	=====	=====
DCAA	9088	16340	28995	60056	121328	157601
=====	=====	=====	=====	=====	=====	=====

FORM VI HERB

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP

ID: 0.50 (mm)

Calibration Time(s): 1704

2048

RF1: 012

COMPOUND	RF1	CURVE	COEFFICIENTS			%RSD OR R^2	MA
			A0	A1	A2		
=====	=====	=====	=====	=====	=====	=====	==
2,4-DB	157499	2ORDR	-9.04e-003	4.822e-006	1.01e-011	0.9998403	0
Dicamba	356790	2ORDR	-4.28e-003	1.013e-006	1.126e-012	0.9999391	0
Dichlorprop	228577	2ORDR	-9.79e-003	2.795e-006	7.136e-012	0.9999235	0
Dalapon	147393	2ORDR	-7.33e-003	2.268e-006	8.085e-012	0.9996880	C
Dinoseb	271766	2ORDR	-6.2e-003	9.93e-007	-1.68e-013	0.9932724	C
MCPA	141799	2ORDR	-1.9041304	2.504e-004	3.303e-009	0.9998884	C
MCPP	91657	2ORDR	-2.0604654	4.603e-004	7.178e-009	0.9997430	C
2,4,5-TP (Silvex)	266465	2ORDR	1.51e-003	6.045e-007	1.208e-012	0.9996141	C
2,4,5-T	281777	2ORDR	-4.61e-004	6.635e-007	8.038e-013	0.9999780	C
2,4-D	244226	2ORDR	-1.61e-002	2.855e-006	5.423e-012	0.9996761	C
=====	=====	=====	=====	=====	=====	=====	==
DCAA	206190	2ORDR	-1.48e-002	3.168e-006	8.563e-012	0.9998612	C

FORM VI HERB

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 24-FEB-2008 10:49  
 Lab File ID: 042.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	CCAL RRF0.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
9 2 DCAA	0.50000	0.53731	258336	0.001	-7.46261	15.00000	Quadratic
1 Dalapon	0.25000	0.27749	376236	0.001	-10.99699	15.00000	Quadratic
13 Dicamba	0.25000	0.26678	863052	0.001	-6.71144	15.00000	Quadratic
14 MCPP	50.00000	51.71683	1205	0.001	-3.43365	15.00000	Quadratic
15 MCPA	50.00000	51.20469	1889	0.001	-2.40938	15.00000	Quadratic
16 Dichlorprop	0.50000	0.52565	281796	0.001	-5.12902	15.00000	Quadratic
17 2,4-D	0.50000	0.51129	289722	0.001	-2.25873	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.13289	1309888	0.001	-6.30811	15.00000	Quadratic
10 2,4,5-T	0.12500	0.12678	1284320	0.001	-1.42146	15.00000	Quadratic
11 2,4-DB	0.50000	0.48285	172760	0.001	3.42934	15.00000	Quadratic
12 Dinoseb	0.12500	0.13366	1154928	0.001	-6.92564	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i      Injection Date: 24-FEB-2008 22:14

Lab File ID: 060.D      Init. Cal. Date(s): 18-NOV-2003    21-FEB-2008

Analysis Type: WATER      Init. Cal. Times:    10:47      20:48

Lab Sample ID: HSTD-CCV      Quant Type:    ESTD

Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRF0.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1\$ 2 DCAA	0.50000	0.50678	246880	0.001	-1.35502	15.00000	Quadratic
11 Dalapon	0.25000	0.25245	349412	0.001	-0.97995	15.00000	Quadratic
13 Dicamba	0.25000	0.24917	815640	0.001	0.33341	15.00000	Quadratic
14 MCPP	50.00000	50.52478	1187	0.001	-1.04956	15.00000	Quadratic
15 MCPA	50.00000	45.15155	1747	0.001	9.69690	15.00000	Quadratic
16 Dichlorprop	0.50000	0.50502	273156	0.001	-1.00361	15.00000	Quadratic
17 2,4-D	0.50000	0.53555	300610	0.001	-7.11041	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12710	1263288	0.001	-1.67989	15.00000	Quadratic
110 2,4,5-T	0.12500	0.12805	1295360	0.001	-2.44012	15.00000	Quadratic
111 2,4-DB	0.50000	0.50456	179338	0.001	-0.91216	15.00000	Quadratic
112 Dinoseb	0.12500	0.12716	1099960	0.001	-1.72761	15.00000	Quadratic



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 25-FEB-2008 03:48  
 Lab File ID: 069.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	CCAL RRF0.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1\$ 2 DCAA	0.50000	0.50051	244504	0.001	-0.10237	15.00000	Quadratic
1 Dalapon	0.25000	0.24676	343204	0.001	1.29689	15.00000	Quadratic
3 Dicamba	0.25000	0.24613	807376	0.001	1.54838	15.00000	Quadratic
4 MCPP	50.00000	50.05595	1180	0.001	-0.11190	15.00000	Quadratic
5 MCPA	50.00000	44.58560	1733	0.001	10.82879	15.00000	Quadratic
6 Dichlorprop	0.50000	0.49980	270952	0.001	0.04022	15.00000	Quadratic
7 2,4-D	0.50000	0.53677	301152	0.001	-7.35360	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12556	1250768	0.001	-0.44762	15.00000	Quadratic
10 2,4,5-T	0.12500	0.12695	1285800	0.001	-1.55788	15.00000	Quadratic
11 2,4-DB	0.50000	0.50242	178692	0.001	-0.48386	15.00000	Quadratic
12 Dinoseb	0.12500	0.12606	1090704	0.001	-0.85107	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i      Injection Date: 26-FEB-2008 08:37  
Lab File ID: 073.D      Init. Cal. Date(s): 18-NOV-2003      21-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:      10:47      20:48  
Lab Sample ID: HSTD-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	CCAL RRF0.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
2 DCAA	0.50000	0.55554	265074	0.001	-11.10735	15.00000	Quadratic
1 Dalapon	0.25000	0.28400	383084	0.001	-13.60089	15.00000	Quadratic
3 Dicamba	0.25000	0.27260	878536	0.001	-9.03960	15.00000	Quadratic
4 MCPP	50.00000	53.68835	1234	0.001	-7.37670	15.00000	Quadratic
5 MCPA	50.00000	51.36391	1893	0.001	-2.72783	15.00000	Quadratic
6 Dichlorprop	0.50000	0.54634	290356	0.001	-9.26877	15.00000	Quadratic
7 2,4-D	0.50000	0.54601	305262	0.001	-9.20294	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.13854	1354808	0.001	-10.83156	15.00000	Quadratic
10 2,4,5-T	0.12500	0.13688	1371176	0.001	-9.50187	15.00000	Quadratic
11 2,4-DB	0.50000	0.52682	186014	0.001	-5.36301	15.00000	Quadratic
12 Dinoseb	0.12500	0.13985	1207408	0.001	-11.87655	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 26-FEB-2008 11:21  
 Lab File ID: 077.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF %D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
2 DCAA	0.50000	0.52550	253930	0.001 -5.10032	15.00000	Quadratic
1 Dalapon	0.25000	0.27362	372140	0.001 -9.44858	15.00000	Quadratic
3 Dicamba	0.25000	0.25620	834684	0.001 -2.48109	15.00000	Quadratic
4 MCPP	50.00000	49.41464	1170	0.001 1.17072	15.00000	Quadratic
5 MCPA	50.00000	44.62263	1734	0.001 10.75473	15.00000	Quadratic
6 Dichlorprop	0.50000	0.50196	271866	0.001 -0.39223	15.00000	Quadratic
7 2,4-D	0.50000	0.51874	293078	0.001 -3.74731	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12844	1274112	0.001 -2.74906	15.00000	Quadratic
10 2,4,5-T	0.12500	0.12864	1300480	0.001 -2.91338	15.00000	Quadratic
11 2,4-DB	0.50000	0.48669	173928	0.001 2.66165	15.00000	Quadratic
12 Dinoseb	0.12500	0.12678	1096712	0.001 -1.42007	15.00000	Quadratic

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP2

ID: 0.42 (mm)

Calibration Time(s): 1704

2048

LAB FILE ID:

RF0.02: 006

RF0.04: 007

RF0.08: 008

RF0.2: 009

RF0.5: 010

RF0.7: 011

COMPOUND	RF0.02	RF0.04	RF0.08	RF0.2	RF0.5	RF0.7
2,4-DB	4429	8316	15774	36286	80830	109256
Dicamba	9653	18320	36038	85536	195927	266691
Dichlorprop	8187	14910	28154	62007	133922	177222
Dalapon	4566	9433	16118	36897	81288	104733
Dinoseb	2094	7777	16880	46589	110909	159057
MCPA	10749	16922	27448	49512	89522	112269
MCPP	6622	10361	17168	31016	55789	70470
2,4,5-TP (Silvex)	5684	11127	23049	59599	147258	203220
2,4,5-T	6330	12148	24753	61099	146782	200264
2,4-D	13150	23359	43061	93050	201157	267861
DCAA	7653	14328	26178	55097	116119	154115

FORM VI HERB

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP2 ID: 0.42 (mm)

Calibration Time(s): 1704

2048

RF1: 012

COMPOUND	RF1	CURVE	COEFFICENTS			%RSD OR R^2	MA
			A0	A1	A2		
=====	=====	=====	=====	=====	=====	=====	==
2,4-DB	149047	2ORDR	-8.53e-003	5.629e-006	7.697e-012	0.9999219	0
Dicamba	364266	2ORDR	-2.05e-003	1.163e-006	5.934e-013	0.9999696	0
Dichlorprop	236311	2ORDR	-9.11e-003	3.138e-006	4.815e-012	0.9999453	0
Dalapon	143839	2ORDR	-5.61e-003	2.749e-006	5.455e-012	0.9995201	0
Dinoseb	223767	2ORDR	1.848e-003	1.069e-006	1.739e-013	0.9997660	0
MCPA	142230	2ORDR	-2.6028993	3.368e-004	2.724e-009	0.9997388	0
MCPP	89670	2ORDR	-2.8035158	5.661e-004	6.533e-009	0.9995755	0
2,4,5-TP (Silvex)	281496	2ORDR	1.113e-003	7.94e-007	3.171e-013	0.9999785	C
2,4,5-T	273205	2ORDR	5.073e-004	7.71e-007	5.169e-013	0.9999833	C
2,4-D	355303	2ORDR	-1.07e-002	2.093e-006	2.116e-012	0.9999484	C
=====	=====	=====	=====	=====	=====	=====	==
DCAA	206441	2ORDR	-1.55e-002	3.715e-006	5.894e-012	0.9998071	C
=====	=====	=====	=====	=====	=====	=====	==

FORM VI HERB

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 24-FEB-2008 10:49  
 Lab File ID: 042.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRF0.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
\$ 2 DCAA	0.50000	0.50662	236670	0.001	-1.32485	15.00000	Quadratic
1 Dalapon	0.25000	0.26306	335176	0.001	-5.22292	15.00000	Quadratic
13 Dicamba	0.25000	0.25417	799872	0.001	-1.66928	15.00000	Quadratic
14 MCPP	50.00000	47.66807	1093	0.001	4.66385	15.00000	Quadratic
15 MCPA	50.00000	51.24477	1835	0.001	-2.48954	15.00000	Quadratic
16 Dichlorprop	0.50000	0.50458	271014	0.001	-0.91575	15.00000	Quadratic
17 2,4-D	0.50000	0.47952	391116	0.001	4.09563	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12382	1168224	0.001	0.94184	15.00000	Quadratic
110 2,4,5-T	0.12500	0.11865	1120576	0.001	5.08372	15.00000	Quadratic
111 2,4-DB	0.50000	0.49537	161254	0.001	0.92692	15.00000	Quadratic
112 Dinoseb	0.12500	0.13953	1009328	0.001	-11.62198	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 24-FEB-2008 22:14  
Lab File ID: 060.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
Lab Sample ID: HSTD-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	CCAL RRF0.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
2 DCAA	0.50000	0.51087	238330	0.001	-2.17386	15.00000	Quadratic
1 Dalapon	0.25000	0.26458	336836	0.001	-5.83142	15.00000	Quadratic
3 Dicamba	0.25000	0.25506	802416	0.001	-2.02553	15.00000	Quadratic
4 MCPP	50.00000	50.63049	1139	0.001	-1.26098	15.00000	Quadratic
5 MCPA	50.00000	50.03380	1806	0.001	-0.06760	15.00000	Quadratic
6 Dichlorprop	0.50000	0.51422	275344	0.001	-2.84426	15.00000	Quadratic
7 2,4-D	0.50000	0.51958	418276	0.001	-3.91509	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12956	1219832	0.001	-3.64438	15.00000	Quadratic
10 2,4,5-T	0.12500	0.13334	1247760	0.001	-6.66846	15.00000	Quadratic
11 2,4-DB	0.50000	0.51984	168350	0.001	-3.96764	15.00000	Quadratic
12 Dinoseb	0.12500	0.13986	1011744	0.001	-11.89094	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 25-FEB-2008 03:48  
Lab File ID: 069.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
Lab Sample ID: HSTD-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
2 DCAA	0.50000	0.50723	236906	0.001	-1.44545	15.00000	Quadratic
1 Dalapon	0.25000	0.25955	331336	0.001	-3.81819	15.00000	Quadratic
3 Dicamba	0.25000	0.25329	797344	0.001	-1.31546	15.00000	Quadratic
4 MCPP	50.00000	50.43933	1136	0.001	-0.87866	15.00000	Quadratic
5 MCPA	50.00000	48.48593	1769	0.001	3.02814	15.00000	Quadratic
6 Dichlorprop	0.50000	0.50973	273328	0.001	-1.94524	15.00000	Quadratic
7 2,4-D	0.50000	0.51858	417610	0.001	-3.71679	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12883	1213336	0.001	-3.06594	15.00000	Quadratic
10 2,4,5-T	0.12500	0.13288	1243840	0.001	-6.30311	15.00000	Quadratic
11 2,4-DB	0.50000	0.51513	166990	0.001	-3.02656	15.00000	Quadratic
12 Dinoseb	0.12500	0.13905	1005904	0.001	-11.24085	15.00000	Quadratic



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 26-FEB-2008 08:37  
 Lab File ID: 073.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	CCAL RRF0.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
19 2 DCAA	0.50000	0.51011	238032	0.001	-2.02133	15.00000	Quadratic
1 Dalapon	0.25000	0.26716	339644	0.001	-6.86244	15.00000	Quadratic
13 Dicamba	0.25000	0.25492	802008	0.001	-1.96839	15.00000	Quadratic
14 MCPP	50.00000	46.82714	1080	0.001	6.34573	15.00000	Quadratic
15 MCPA	50.00000	55.40108	1933	0.001	-10.80216	15.00000	Quadratic
16 Dichlorprop	0.50000	0.51089	273848	0.001	-2.17695	15.00000	Quadratic
17 2,4-D	0.50000	0.49706	403076	0.001	0.58731	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12767	1202904	0.001	-2.13772	15.00000	Quadratic
10 2,4,5-T	0.12500	0.12640	1187960	0.001	-1.11672	15.00000	Quadratic
11 2,4-DB	0.50000	0.49605	161454	0.001	0.78950	15.00000	Quadratic
12 Dinoseb	0.12500	0.14025	1014512	0.001	-12.19912	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 26-FEB-2008 11:21  
Lab File ID: 077.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
Lab Sample ID: HSTD-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	CCAL RRF0.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
9 2 DCAA	0.50000	0.51109	238418	0.001	-2.21891	15.00000	Quadratic
1 Dalapon	0.25000	0.26745	339960	0.001	-6.97860	15.00000	Quadratic
3 Dicamba	0.25000	0.25427	800152	0.001	-1.70848	15.00000	Quadratic
4 MCPP	50.00000	49.40591	1120	0.001	1.18818	15.00000	Quadratic
5 MCPA	50.00000	52.36002	1862	0.001	-4.72004	15.00000	Quadratic
6 Dichlorprop	0.50000	0.51000	273452	0.001	-2.00048	15.00000	Quadratic
7 2,4-D	0.50000	0.50608	409186	0.001	-1.21666	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12737	1200144	0.001	-1.89229	15.00000	Quadratic
10 2,4,5-T	0.12500	0.12858	1206872	0.001	-2.86749	15.00000	Quadratic
11 2,4-DE	0.50000	0.51083	165744	0.001	-2.16561	15.00000	Quadratic
12 Dinoseb	0.12500	0.14079	1018376	0.001	-12.62938	15.00000	Quadratic

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuarez  
 Curve Type : Average

## Calibration File Names:

Level 1: \\Nitro\chem\ECD-7.i\080225.b\008.D  
 Level 2: \\Nitro\chem\ECD-7.i\080225.b\009.D  
 Level 3: \\Nitro\chem\ECD-7.i\080225.b\010.D  
 Level 4: \\Nitro\chem\ECD-7.i\080225.b\011.D  
 Level 5: \\Nitro\chem\ECD-7.i\080225.b\012.D  
 Level 6: \\Nitro\chem\ECD-7.i\080225.b\013.D

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD
Level 1	Level 2	Level 3	Level 4	Level 5	Level 6			
24 Aroclor-1016(1)	158840	159210	146484	133258	127241	123063	141349	11.187
(2)	310860	291860	260992	235770	224535	216610	256771	14.848
(3)	408820	386270	334092	310422	300047	292621	338712	14.231
(4)	293400	278730	252684	230108	219207	211584	247619	13.396
(5)	229680	214740	190444	172898	163516	156677	187993	15.539
25 Aroclor-1221(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
26 Aroclor-1232(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
27 Aroclor-1242(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
28 Aroclor-1248(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
29 Aroclor-1254(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuares  
 Curve Type : Average

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
Level 1	Level 2	Level 3	Level 4	Level 5	Level 6				
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
30 Aroclor-1260(1)	435960	398870	352160	317264	304503	297008	350961	15.980	
(2)	662140	594040	528220	479210	464583	454213	530401	15.585	
(3)	338000	311930	278716	250210	239115	233383	275226	15.399	
(4)	393520	363710	328700	295740	284957	280092	324453	14.246	
(5)	800000	720480	655308	600802	587904	582351	657808	13.250	
41 Aroclor-1268(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
\$ 1 Tetrachloro-m-Xylene	8170200	7632900	7121200	6786120	6713173	6662370	7180994	8.425	
\$ 33 Decachlorobiphenyl (DCB)	7602000	6638300	6236720	5612620	5363707	5408550	6143649	14.210	

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i Injection Date: 26-FEB-2008 09:15  
Lab File ID: 034.D Init. Cal. Date(s): 25-FEB-2008 25-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 18:27 21:18  
Lab Sample ID: AR1660-CCV Quant. Type: ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m

COMPOUND	RRF / AMOUNT	MIN		MAX		CURVE TYPE
		RFO.500	RRF	%D / %DRIFT	%D / %DRIFT	
\$ 1 Tetrachloro-m-Xylene	7180994	7034200	0.010	2.04420	15.00000	Averaged
24 Aroclor-1016(1)	141349	147488	0.010	-4.34286	15.00000	Averaged
(2)	256771	263304	0.010	-2.54425	15.00000	Averaged
(3)	338712	341120	0.010	-0.71094	15.00000	Averaged
(4)	247619	250792	0.010	-1.28149	15.00000	Averaged
(5)	187993	189168	0.010	-0.62529	15.00000	Averaged
30 Aroclor-1260(1)	350961	352584	0.010	-0.46251	15.00000	Averaged
(2)	530401	525912	0.010	0.84633	15.00000	Averaged
(3)	275226	279064	0.010	-1.39463	15.00000	Averaged
(4)	324453	329316	0.010	-1.49876	15.00000	Averaged
(5)	657808	654848	0.010	0.44990	15.00000	Averaged
\$ 33 Decachlorobiphenyl (DCB)	6143649	6148040	0.010	-0.07146	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i      Injection Date: 26-FEB-2008 20:03  
Lab File ID: 053.D      Init. Cal. Date(s): 25-FEB-2008    25-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    18:27      21:18  
Lab Sample ID: AR1660-CCV    Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m

COMPOUND	RRF / AMOUNT	RFO.500	MIN		MAX		CURVE TYPE
			RRF	%D / %DRIFT	%D / %DRIFT		
1 Tetrachloro-m-Xylene	7180994	7195880	0.010	-0.20730	15.00000		Averaged
24 Aroclor-1016(1)	141349	149932	0.010	-6.07191	15.00000		Averaged
(2)	256771	267300	0.010	-4.10050	15.00000		Averaged
(3)	338712	341460	0.010	-0.81133	15.00000		Averaged
(4)	247619	252168	0.010	-1.83719	15.00000		Averaged
(5)	187993	192216	0.010	-2.24663	15.00000		Averaged
30 Aroclor-1260(1)	350961	361564	0.010	-3.02120	15.00000		Averaged
(2)	530401	539064	0.010	-1.63330	15.00000		Averaged
(3)	275226	286664	0.010	-4.15600	15.00000		Averaged
(4)	324453	336916	0.010	-3.84116	15.00000		Averaged
(5)	657808	671424	0.010	-2.06998	15.00000		Averaged
33 Decachlorobiphenyl (DCB)	6143649	6398480	0.010	-4.14787	15.00000		Averaged

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuares  
 Curve Type : Average

## Calibration File Names:

Level 1: \\Nitro\chem\ECD-7.i\080225.b\080225.b\008.D  
 Level 2: \\Nitro\chem\ECD-7.i\080225.b\080225.b\009.D  
 Level 3: \\Nitro\chem\ECD-7.i\080225.b\080225.b\010.D  
 Level 4: \\Nitro\chem\ECD-7.i\080225.b\080225.b\011.D  
 Level 5: \\Nitro\chem\ECD-7.i\080225.b\080225.b\012.D  
 Level 6: \\Nitro\chem\ECD-7.i\080225.b\080225.b\013.D

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
Level 1	Level 2	Level 3	Level 4	Level 5	Level 6				
24 Aroclor-1016(1)	188840	173810	160312	151714	148364	143570	161102	10.713	
(2)	389440	365910	331688	304708	293963	285983	328615	12.686	
(3)	495640	471650	418528	394776	391996	380247	425473	11.130	
(4)	346180	342590	296512	269896	259909	257690	295463	13.655	
(5)	279820	264950	236324	218764	210175	204070	235684	13.066	
25 Aroclor-1221(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
26 Aroclor-1232(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
27 Aroclor-1242(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
28 Aroclor-1248(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
29 Aroclor-1254(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuares  
 Curve Type : Average

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
	Level 1	Level 2	Level 3	Level 4	Level 5	Level 6			
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
30 Aroclor-1260(1)	567080	523680	461776	423508	411521	399843	464568	14.504	
(2)	664040	607800	538796	501720	490820	478908	547014	13.510	
(3)	437600	407420	360736	334666	324281	318156	363810	13.383	
(4)	473600	429170	392640	363974	355959	348920	394044	12.410	
(5)	976180	895200	839180	787730	780368	775746	842401	9.493	
41 Aroclor-1268(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
\$ 1 Tetrachloro-m-Xylene	8765400	8524000	8383480	8206820	8182640	8157320	8369943	2.863	
\$ 33 Decachlorobiphenyl (DCB)	9036200	8137400	7697400	6931260	6726533	6806400	7555866	12.114	



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i Injection Date: 26-FEB-2008 09:15  
Lab File ID: 034.D Init. Cal. Date(s): 25-FEB-2008 25-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 18:27 21:18  
Lab Sample ID: AR1660-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m

COMPOUND	RRF / AMOUNT	RFO.500	MIN	MAX	CURVE TYPE
\$ 1 Tetrachloro-m-Xylene	8369943	7717080	0.010	7.80009	15.00000 Averaged
24 Aroclor-1016(1)	161102	152524	0.010	5.32438	15.00000 Averaged
(2)	328615	312224	0.010	4.98798	15.00000 Averaged
(3)	425473	405392	0.010	4.71965	15.00000 Averaged
(4)	295463	282664	0.010	4.33181	15.00000 Averaged
(5)	235684	229000	0.010	2.83591	15.00000 Averaged
30 Aroclor-1260(1)	464568	439964	0.010	5.29611	15.00000 Averaged
(2)	547014	516992	0.010	5.48834	15.00000 Averaged
(3)	363810	346632	0.010	4.72167	15.00000 Averaged
(4)	394044	373140	0.010	5.30494	15.00000 Averaged
(5)	842401	790092	0.010	6.20948	15.00000 Averaged
\$ 33 Decachlorobiphenyl (DCB)	7555866	7187520	0.010	4.87496	15.00000 Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i Injection Date: 26-FEB-2008 20:03  
Lab File ID: 053.D Init. Cal. Date(s): 25-FEB-2008 25-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 18:27 21:18  
Lab Sample ID: AR1660-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m

COMPOUND	RRF / AMOUNT	MIN		MAX		CURVE TYPE
		RFO.500	RRF	%D / %DRIFT	%D / %DRIFT	
\$ 1 Tetrachloro-m-Xylene	8369943	7609760	0.010	9.08230	15.00000	Averaged
24 Aroclor-1016(1)	161102	152096	0.010	5.59005	15.00000	Averaged
(2)	328615	309240	0.010	5.89604	15.00000	Averaged
(3)	425473	395192	0.010	7.11698	15.00000	Averaged
(4)	295463	278164	0.010	5.85484	15.00000	Averaged
(5)	235684	226188	0.010	4.02903	15.00000	Averaged
30 Aroclor-1260(1)	464568	437796	0.010	5.76278	15.00000	Averaged
(2)	547014	511096	0.010	6.56619	15.00000	Averaged
(3)	363810	345776	0.010	4.95695	15.00000	Averaged
(4)	394044	372612	0.010	5.43893	15.00000	Averaged
(5)	842401	788956	0.010	6.34433	15.00000	Averaged
\$ 33 Decachlorobiphenyl (DCB)	7555866	7272560	0.010	3.74948	15.00000	Averaged

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802304

Instrument ID: FID-2

Calibration Date(s): 02/18/08 02/19/08

Column:

ID: 2.00 (mm)

Calibration Time(s): 1455

0655

LAB FILE ID:

RF10: 016

RF50: 017

RF100: 018

RF250: 019

RF500: 020

COMPOUND	RF10	RF50	RF100	RF250	RF500
TPH-ORO (>C28-C35)	2410.000	1820.860	1920.020	1804.828	1577.508
TPH-DRO (>C10-C28)	2410.000	1820.860	1920.020	1804.828	1577.508
TPH-GRO (C6-C10)	2074.300	1871.040	1309.020	1221.916	1096.358
2-Fluorobiphenyl	1088.600	1268.100	1149.840	1445.700	1377.340

FORM VI TPH

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802304

Instrument ID: FID-2 Calibration Date(s): 02/18/08 02/19/08

Column: ID: 2.00 (mm) Calibration Time(s): 1455 0655

LAB FILE ID: RF1000: 021 RF2000: 008

COMPOUND	RF1000	RF2000
=====	=====	=====
TPH-ORO (>C28-C35)_____	1683.375	1825.634
TPH-DRO (>C10-C28)_____	1683.375	1825.634
TPH-GRO (C6-C10)_____	1088.556	1061.624
=====	=====	=====
2-Fluorobiphenyl_____	1316.250	_____
_____	_____	_____

FORM VI TPH

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802304

Instrument ID: FID-2 Calibration Date(s): 02/18/08 02/19/08

Column: ID: 2.00 (mm) Calibration Time(s): 1455 0655

COMPOUND	CURVE	COEFFICIENTS		%RSD OR R^2
		A0	A1	
TPH-ORO (>C28-C35)	AVRG		1863.17507	14.2
TPH-DRO (>C10-C28)	AVRG		1863.17507	14.2
TPH-GRO (C6-C10)	LINR	-28.205917	9.529e-004	1.000
2-Fluorobiphenyl	AVRG		1274.30500	10.6

FORM VI TPH

FORM 7  
TPH CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802304

Instrument ID: FID-2 Calibration Date: 02/21/08 Time: 2134

Lab File ID: 037 Init. Calib. Date(s): 02/18/08 02/19/08

Init. Calib. Times: 1455 0655

GC Column: \_\_\_\_\_ ID: 2.00 (mm)

COMPOUND	SAMPLE AMOUNT	CAL100 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
C6-C12	236.170	250.000	LINR	5.5	25.0
>C12-C28	236.860	250.000	AVRG	5.2	25.0
<del>C28-C35</del>	<del>0.000</del>	<del>250.000</del>	<del>AVRG</del>	<del>100.0</del>	<del>25.0</del>
=====	=====	=====	=====	=====	=====
Trifluoromethyl benzene	48.387	50.000	AVRG	3.2	25.0
2-Fluorobiphenyl	52.671	50.000	AVRG	5.3	25.0

FORM VII TPH

FORM 7  
TPH CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802304

Instrument ID: FID-2 Calibration Date: 02/22/08 Time: 1327

Lab File ID: 056 Init. Calib. Date(s): 02/18/08 02/19/08

Init. Calib. Times: 1455 0655

GC Column: \_\_\_\_\_ ID: 2.00 (mm)

COMPOUND	SAMPLE AMOUNT	CAL100 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
C6-C12	273.834	250.000	LINR	9.5	25.0
>C12-C28	294.192	250.000	AVRG	17.7	25.0
<del>C28-C35</del>	<del>0.000</del>	<del>250.000</del>	<del>AVRG</del>	<del>100.0</del>	<del>25.0</del>
=====	=====	=====	=====	=====	=====
Trifluoromethyl benzene	52.548	50.000	AVRG	5.1	25.0
2-Fluorobiphenyl	58.362	50.000	AVRG	16.7	25.0

FORM VII TPH

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	98.77	98.77	97.15	97.15	P
Antimony	100.0	103.40	103.4	100.0	94.89	94.89	94.70	94.7	P
Arsenic	100.0	98.49	98.49	100.0	99.99	99.99	98.52	98.52	P
Barium	100.0	100.00	100	100.0	100.90	100.9	101.20	101.2	P
Beryllium	100.0	99.36	99.36	100.0	100.10	100.1	98.64	98.64	P
Boron	500.0	526.60	105.32	500.0	497.00	99.4	492.70	98.54	P
Cadmium	100.0	100.10	100.1	100.0	100.70	100.7	100.80	100.8	P
Calcium	10000.0	10260.00	102.6	10000.0	10310.00	103.1	9769.00	97.69	P
Chromium	100.0	97.92	97.92	100.0	99.65	99.65	100.20	100.2	P
Cobalt	100.0	100.40	100.4	100.0	99.79	99.79	99.71	99.71	P
Copper	100.0	102.40	102.4	100.0	101.70	101.7	99.15	99.15	P
Iron	10000.0	10010.00	100.1	10000.0	10200.00	102	10020.00	100.2	P
Lead	100.0	102.40	102.4	100.0	102.30	102.3	100.70	100.7	P
Magnesium	10000.0	9905.00	99.05	10000.0	10220.00	102.2	10020.00	100.2	P
Manganese	100.0	98.36	98.36	100.0	99.96	99.96	100.80	100.8	P
Molybdenum	100.0	101.00	101	100.0	102.40	102.4	100.40	100.4	P
Nickel	100.0	102.20	102.2	100.0	99.82	99.82	100.10	100.1	P
Potassium	10000.0	9853.00	98.53	10000.0	10090.00	100.9	10030.00	100.3	P
Selenium	100.0	99.30	99.3	100.0	103.10	103.1	100.90	100.9	P
Silver	100.0	104.50	104.5	100.0	103.00	103	102.20	102.2	P
Sodium	10000.0	9735.00	97.35	10000.0	9935.00	99.35	9901.00	99.01	P
Strontium	100.0	100.30	100.3	100.0	102.50	102.5	102.30	102.3	P
Thallium	100.0	98.79	98.79	100.0	100.70	100.7	99.80	99.8	P
Tin	100.0	106.30	106.3	100.0	103.50	103.5	103.10	103.1	P
Titanium	100.0	101.30	101.3	100.0	99.28	99.28	99.80	99.8	P
Vanadium	100.0	100.40	100.4	100.0	99.12	99.12	101.20	101.2	P
Zinc	100.0	99.05	99.05	100.0	99.02	99.02	98.22	98.22	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN



2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	108.90	108.9	115.60	115.6	P
Antimony	100.0	103.40	103.4	100.0	92.31	92.31	100.30	100.3	P
Arsenic	100.0	98.49	98.49	100.0	96.93	96.93	99.22	99.22	P
Barium	100.0	100.00	100	100.0	99.24	99.24	99.78	99.78	P
Beryllium	100.0	99.36	99.36	100.0	97.16	97.16	97.99	97.99	P
Boron	500.0	526.60	105.32	500.0	481.00	96.2	485.00	97	P
Cadmium	100.0	100.10	100.1	100.0	99.18	99.18	98.75	98.75	P
Calcium	10000.0	10260.00	102.6	10000.0	9881.00	98.81	10790.00	107.9	P
Chromium	100.0	97.92	97.92	100.0	97.99	97.99	99.34	99.34	P
Cobalt	100.0	100.40	100.4	100.0	95.71	95.71	95.87	95.87	P
Copper	100.0	102.40	102.4	100.0	95.52	95.52	96.91	96.91	P
Iron	10000.0	10010.00	100.1	10000.0	9870.00	98.7	9931.00	99.31	P
Lead	100.0	102.40	102.4	100.0	100.20	100.2	98.80	98.8	P
Magnesium	10000.0	9905.00	99.05	10000.0	10110.00	101.1	10400.00	104	P
Manganese	100.0	98.36	98.36	100.0	99.93	99.93	101.80	101.8	P
Molybdenum	100.0	101.00	101	100.0	98.03	98.03	96.91	96.91	P
Nickel	100.0	102.20	102.2	100.0	94.49	94.49	97.15	97.15	P
Potassium	10000.0	9853.00	98.53	10000.0	10170.00	101.7	10480.00	104.8	P
Selenium	100.0	99.30	99.3	100.0	100.30	100.3	102.20	102.2	P
Silver	100.0	104.50	104.5	100.0	98.83	98.83	98.07	98.07	P
Sodium	10000.0	9735.00	97.35	10000.0	9844.00	98.44	10100.00	101	P
Strontium	100.0	100.30	100.3	100.0	103.10	103.1	103.00	103	P
Thallium	100.0	98.79	98.79	100.0	98.74	98.74	97.84	97.84	P
Tin	100.0	106.30	106.3	100.0	99.86	99.86	99.58	99.58	P
Titanium	100.0	101.30	101.3	100.0	98.57	98.57	98.96	98.96	P
Vanadium	100.0	100.40	100.4	100.0	98.91	98.91	100.30	100.3	P
Zinc	100.0	99.05	99.05	100.0	95.98	95.98	96.80	96.8	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	119.80	119.8	114.60	114.6	P
Antimony	100.0	103.40	103.4	100.0	93.51	93.51	92.53	92.53	P
Arsenic	100.0	98.49	98.49	100.0	96.69	96.69	95.40	95.4	P
Barium	100.0	100.00	100	100.0	98.98	98.98	98.87	98.87	P
Beryllium	100.0	99.36	99.36	100.0	96.89	96.89	94.49	94.49	P
Boron	500.0	526.60	105.32	500.0	484.50	96.9	477.80	95.56	P
Cadmium	100.0	100.10	100.1	100.0	99.06	99.06	97.25	97.25	P
Calcium	10000.0	10260.00	102.6	10000.0	10250.00	102.5	10470.00	104.7	P
Chromium	100.0	97.92	97.92	100.0	96.46	96.46	95.78	95.78	P
Cobalt	100.0	100.40	100.4	100.0	95.98	95.98	95.25	95.25	P
Copper	100.0	102.40	102.4	100.0	95.15	95.15	94.55	94.55	P
Iron	10000.0	10010.00	100.1	10000.0	9746.00	97.46	9652.00	96.52	P
Lead	100.0	102.40	102.4	100.0	100.90	100.9	101.00	101	P
Magnesium	10000.0	9905.00	99.05	10000.0	10100.00	101	10240.00	102.4	P
Manganese	100.0	98.36	98.36	100.0	99.36	99.36	98.22	98.22	P
Molybdenum	100.0	101.00	101	100.0	93.66	93.66	94.18	94.18	P
Nickel	100.0	102.20	102.2	100.0	95.09	95.09	95.95	95.95	P
Potassium	10000.0	9853.00	98.53	10000.0	10210.00	102.1	10350.00	103.5	P
Selenium	100.0	99.30	99.3	100.0	98.52	98.52	98.72	98.72	P
Silver	100.0	104.50	104.5	100.0	97.80	97.8	96.88	96.88	P
Sodium	10000.0	9735.00	97.35	10000.0	9705.00	97.05	9892.00	98.92	P
Strontium	100.0	100.30	100.3	100.0	101.90	101.9	102.10	102.1	P
Thallium	100.0	98.79	98.79	100.0	97.90	97.9	95.92	95.92	P
Tin	100.0	106.30	106.3	100.0	101.50	101.5	100.60	100.6	P
Titanium	100.0	101.30	101.3	100.0	101.80	101.8	100.20	100.2	P
Vanadium	100.0	100.40	100.4	100.0	100.40	100.4	99.56	99.56	P
Zinc	100.0	99.05	99.05	100.0	93.64	93.64	93.26	93.26	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	115.20	115.2	115.30	115.3	P
Antimony	100.0	103.40	103.4	100.0	93.09	93.09	96.39	96.39	P
Arsenic	100.0	98.49	98.49	100.0	96.89	96.89	96.78	96.78	P
Barium	100.0	100.00	100	100.0	97.78	97.78	99.01	99.01	P
Beryllium	100.0	99.36	99.36	100.0	96.39	96.39	96.22	96.22	P
Boron	500.0	526.60	105.32	500.0	487.70	97.54	504.90	100.98	P
Cadmium	100.0	100.10	100.1	100.0	97.43	97.43	97.84	97.84	P
Calcium	10000.0	10260.00	102.6	10000.0	10830.00	108.3	10770.00	107.7	P
Chromium	100.0	97.92	97.92	100.0	95.29	95.29	96.41	96.41	P
Cobalt	100.0	100.40	100.4	100.0	94.40	94.4	94.84	94.84	P
Copper	100.0	102.40	102.4	100.0	94.03	94.03	95.49	95.49	P
Iron	10000.0	10010.00	100.1	10000.0	9676.00	96.76	9780.00	97.8	P
Lead	100.0	102.40	102.4	100.0	101.30	101.3	101.30	101.3	P
Magnesium	10000.0	9905.00	99.05	10000.0	9892.00	98.92	10080.00	100.8	P
Manganese	100.0	98.36	98.36	100.0	98.63	98.63	99.14	99.14	P
Molybdenum	100.0	101.00	101	100.0	93.30	93.3	94.00	94	P
Nickel	100.0	102.20	102.2	100.0	94.42	94.42	95.61	95.61	P
Potassium	10000.0	9853.00	98.53	10000.0	10310.00	103.1	10560.00	105.6	P
Selenium	100.0	99.30	99.3	100.0	97.34	97.34	100.60	100.6	P
Silver	100.0	104.50	104.5	100.0	96.16	96.16	97.22	97.22	P
Sodium	10000.0	9735.00	97.35	10000.0	9564.00	95.64	9823.00	98.23	P
Strontium	100.0	100.30	100.3	100.0	103.60	103.6	103.80	103.8	P
Thallium	100.0	98.79	98.79	100.0	97.46	97.46	98.52	98.52	P
Tin	100.0	106.30	106.3	100.0	100.20	100.2	100.40	100.4	P
Titanium	100.0	101.30	101.3	100.0	100.30	100.3	101.10	101.1	P
Vanadium	100.0	100.40	100.4	100.0	99.69	99.69	100.00	100	P
Zinc	100.0	99.05	99.05	100.0	90.32	90.32	90.35	90.35	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	101.10	101.1	110.40	110.4	P
Antimony	100.0	103.40	103.4	100.0	96.99	96.99	96.20	96.2	P
Arsenic	100.0	98.49	98.49	100.0	96.94	96.94	101.00	101	P
Barium	100.0	100.00	100	100.0	101.10	101.1	102.30	102.3	P
Beryllium	100.0	99.36	99.36	100.0	100.50	100.5	101.60	101.6	P
Boron	500.0	526.60	105.32	500.0	506.40	101.28	505.10	101.02	P
Cadmium	100.0	100.10	100.1	100.0	100.80	100.8	101.60	101.6	P
Calcium	10000.0	10260.00	102.6	10000.0	10040.00	100.4	9754.00	97.54	P
Chromium	100.0	97.92	97.92	100.0	97.45	97.45	101.30	101.3	P
Cobalt	100.0	100.40	100.4	100.0	102.00	102	102.50	102.5	P
Copper	100.0	102.40	102.4	100.0	102.30	102.3	103.40	103.4	P
Iron	10000.0	10010.00	100.1	10000.0	9901.00	99.01	10060.00	100.6	P
Lead	100.0	102.40	102.4	100.0	102.10	102.1	101.70	101.7	P
Magnesium	10000.0	9905.00	99.05	10000.0	9954.00	99.54	10160.00	101.6	P
Manganese	100.0	98.36	98.36	100.0	98.52	98.52	102.00	102	P
Molybdenum	100.0	101.00	101	100.0	99.98	99.98	101.10	101.1	P
Nickel	100.0	102.20	102.2	100.0	100.80	100.8	102.70	102.7	P
Potassium	10000.0	9853.00	98.53	10000.0	9942.00	99.42	10160.00	101.6	P
Selenium	100.0	99.30	99.3	100.0	97.44	97.44	98.46	98.46	P
Silver	100.0	104.50	104.5	100.0	104.40	104.4	102.80	102.8	P
Sodium	10000.0	9735.00	97.35	10000.0	9835.00	98.35	10150.00	101.5	P
Strontium	100.0	100.30	100.3	100.0	100.10	100.1	101.10	101.1	P
Thallium	100.0	98.79	98.79	100.0	99.53	99.53	99.31	99.31	P
Tin	100.0	106.30	106.3	100.0	105.50	105.5	100.70	100.7	P
Titanium	100.0	101.30	101.3	100.0	102.60	102.6	105.80	105.8	P
Vanadium	100.0	100.40	100.4	100.0	99.79	99.79	100.80	100.8	P
Zinc	100.0	99.05	99.05	100.0	99.88	99.88	102.90	102.9	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	125.50	125.5	97.16	97.16	P
Antimony	100.0	103.40	103.4	100.0	92.46	92.46	92.47	92.47	P
Arsenic	100.0	98.49	98.49	100.0	98.64	98.64	97.47	97.47	P
Barium	100.0	100.00	100	100.0	100.60	100.6	93.64	93.64	P
Beryllium	100.0	99.36	99.36	100.0	101.50	101.5	92.89	92.89	P
Boron	500.0	526.60	105.32	500.0	506.40	101.28	455.40	91.08	P
Cadmium	100.0	100.10	100.1	100.0	100.60	100.6	92.68	92.68	P
Calcium	10000.0	10260.00	102.6	10000.0	9776.00	97.76	9529.00	95.29	P
Chromium	100.0	97.92	97.92	100.0	97.46	97.46	97.63	97.63	P
Cobalt	100.0	100.40	100.4	100.0	101.20	101.2	99.09	99.09	P
Copper	100.0	102.40	102.4	100.0	103.00	103	95.20	95.2	P
Iron	10000.0	10010.00	100.1	10000.0	9826.00	98.26	9432.00	94.32	P
Lead	100.0	102.40	102.4	100.0	101.90	101.9	92.64	92.64	P
Magnesium	10000.0	9905.00	99.05	10000.0	9909.00	99.09	9363.00	93.63	P
Manganese	100.0	98.36	98.36	100.0	99.36	99.36	97.87	97.87	P
Molybdenum	100.0	101.00	101	100.0	99.19	99.19	93.22	93.22	P
Nickel	100.0	102.20	102.2	100.0	102.30	102.3	94.16	94.16	P
Potassium	10000.0	9853.00	98.53	10000.0	10040.00	100.4	9461.00	94.61	P
Selenium	100.0	99.30	99.3	100.0	99.57	99.57	94.87	94.87	P
Silver	100.0	104.50	104.5	100.0	104.70	104.7	95.35	95.35	P
Sodium	10000.0	9735.00	97.35	10000.0	9847.00	98.47	9408.00	94.08	P
Strontium	100.0	100.30	100.3	100.0	101.10	101.1	94.10	94.1	P
Thallium	100.0	98.79	98.79	100.0	99.44	99.44	92.67	92.67	P
Tin	100.0	106.30	106.3	100.0	106.30	106.3	93.93	93.93	P
Titanium	100.0	101.30	101.3	100.0	102.00	102	93.67	93.67	P
Vanadium	100.0	100.40	100.4	100.0	101.00	101	98.74	98.74	P
Zinc	100.0	99.05	99.05	100.0	100.00	100	98.05	98.05	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.00	100	100.0	111.60	111.6	114.80	114.8	P
Antimony	100.0	103.40	103.4	100.0	95.84	95.84	98.30	98.3	P
Arsenic	100.0	98.49	98.49	100.0	100.70	100.7	103.40	103.4	P
Barium	100.0	100.00	100	100.0	100.20	100.2	102.30	102.3	P
Beryllium	100.0	99.36	99.36	100.0	99.99	99.99	101.90	101.9	P
Boron	500.0	526.60	105.32	500.0	497.30	99.46	509.00	101.8	P
Cadmium	100.0	100.10	100.1	100.0	101.80	101.8	100.70	100.7	P
Calcium	10000.0	10260.00	102.6	10000.0	10520.00	105.2	10050.00	100.5	P
Chromium	100.0	97.92	97.92	100.0	100.80	100.8	102.70	102.7	P
Cobalt	100.0	100.40	100.4	100.0	102.20	102.2	103.20	103.2	P
Copper	100.0	102.40	102.4	100.0	103.90	103.9	103.80	103.8	P
Iron	10000.0	10010.00	100.1	10000.0	10170.00	101.7	10300.00	103	P
Lead	100.0	102.40	102.4	100.0	101.00	101	100.20	100.2	P
Magnesium	10000.0	9905.00	99.05	10000.0	10430.00	104.3	10370.00	103.7	P
Manganese	100.0	98.36	98.36	100.0	101.60	101.6	103.50	103.5	P
Molybdenum	100.0	101.00	101	100.0	101.30	101.3	100.60	100.6	P
Nickel	100.0	102.20	102.2	100.0	103.70	103.7	103.50	103.5	P
Potassium	10000.0	9853.00	98.53	10000.0	10420.00	104.2	10510.00	105.1	P
Selenium	100.0	99.30	99.3	100.0	102.60	102.6	104.70	104.7	P
Silver	100.0	104.50	104.5	100.0	104.10	104.1	103.60	103.6	P
Sodium	10000.0	9735.00	97.35	10000.0	10430.00	104.3	10400.00	104	P
Strontium	100.0	100.30	100.3	100.0	102.40	102.4	102.70	102.7	P
Thallium	100.0	98.79	98.79	100.0	101.60	101.6	100.50	100.5	P
Tin	100.0	106.30	106.3	100.0	103.20	103.2	102.50	102.5	P
Titanium	100.0	101.30	101.3	100.0	101.80	101.8	105.80	105.8	P
Vanadium	100.0	100.40	100.4	100.0	102.70	102.7	103.10	103.1	P
Zinc	100.0	99.05	99.05	100.0	103.80	103.8	106.10	106.1	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	95.40	95.4	98.62	98.62	P
Antimony	100.0	94.79	94.79	100.0	96.23	96.23	96.28	96.28	P
Arsenic	100.0	96.28	96.28	100.0	97.18	97.18	97.59	97.59	P
Barium	100.0	99.64	99.64	100.0	97.00	97	101.80	101.8	P
Beryllium	100.0	98.99	98.99	100.0	97.33	97.33	98.41	98.41	P
Boron	500.0	519.80	103.96	500.0	480.80	96.16	485.00	97	P
Cadmium	100.0	100.20	100.2	100.0	98.72	98.72	101.70	101.7	P
Calcium	10000.0	9632.00	96.32	10000.0	9669.00	96.69	9923.00	99.23	P
Chromium	100.0	96.50	96.5	100.0	96.47	96.47	97.32	97.32	P
Cobalt	100.0	99.74	99.74	100.0	97.01	97.01	98.41	98.41	P
Copper	100.0	100.70	100.7	100.0	99.28	99.28	100.60	100.6	P
Iron	10000.0	9781.00	97.81	10000.0	9852.00	98.52	9987.00	99.87	P
Lead	100.0	102.90	102.9	100.0	98.66	98.66	101.30	101.3	P
Magnesium	10000.0	9861.00	98.61	10000.0	9840.00	98.4	9983.00	99.83	P
Manganese	100.0	97.42	97.42	100.0	98.20	98.2	100.10	100.1	P
Molybdenum	100.0	97.99	97.99	100.0	97.84	97.84	98.54	98.54	P
Nickel	100.0	99.96	99.96	100.0	98.04	98.04	100.10	100.1	P
Potassium	10000.0	9685.00	96.85	10000.0	9753.00	97.53	9865.00	98.65	P
Selenium	100.0	97.35	97.35	100.0	102.00	102	101.90	101.9	P
Silver	100.0	102.60	102.6	100.0	100.10	100.1	99.87	99.87	P
Sodium	10000.0	9801.00	98.01	10000.0	9689.00	96.89	9880.00	98.8	P
Strontium	100.0	98.14	98.14	100.0	97.74	97.74	99.39	99.39	P
Thallium	100.0	100.50	100.5	100.0	98.50	98.5	100.70	100.7	P
Tin	100.0	103.20	103.2	100.0	97.53	97.53	98.39	98.39	P
Titanium	100.0	99.87	99.87	100.0	98.08	98.08	100.20	100.2	P
Vanadium	100.0	99.33	99.33	100.0	98.85	98.85	98.45	98.45	P
Zinc	100.0	99.32	99.32	100.0	98.73	98.73	96.95	96.95	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	100.90	100.9	94.88	94.88	P
Antimony	100.0	94.79	94.79	100.0	97.26	97.26	96.66	96.66	P
Arsenic	100.0	96.28	96.28	100.0	97.23	97.23	94.47	94.47	P
Barium	100.0	99.64	99.64	100.0	100.90	100.9	97.15	97.15	P
Beryllium	100.0	98.99	98.99	100.0	98.74	98.74	94.73	94.73	P
Boron	500.0	519.80	103.96	500.0	487.40	97.48	477.10	95.42	P
Cadmium	100.0	100.20	100.2	100.0	103.30	103.3	98.43	98.43	P
Calcium	10000.0	9632.00	96.32	10000.0	10030.00	100.3	9425.00	94.25	P
Chromium	100.0	96.50	96.5	100.0	98.86	98.86	94.66	94.66	P
Cobalt	100.0	99.74	99.74	100.0	98.99	98.99	94.98	94.98	P
Copper	100.0	100.70	100.7	100.0	100.80	100.8	96.11	96.11	P
Iron	10000.0	9781.00	97.81	10000.0	10150.00	101.5	9662.00	96.62	P
Lead	100.0	102.90	102.9	100.0	103.30	103.3	97.17	97.17	P
Magnesium	10000.0	9861.00	98.61	10000.0	10440.00	104.4	9603.00	96.03	P
Manganese	100.0	97.42	97.42	100.0	100.80	100.8	98.71	98.71	P
Molybdenum	100.0	97.99	97.99	100.0	100.30	100.3	94.98	94.98	P
Nickel	100.0	99.96	99.96	100.0	99.38	99.38	93.86	93.86	P
Potassium	10000.0	9685.00	96.85	10000.0	9987.00	99.87	9426.00	94.26	P
Selenium	100.0	97.35	97.35	100.0	104.10	104.1	97.74	97.74	P
Silver	100.0	102.60	102.6	100.0	103.00	103	97.41	97.41	P
Sodium	10000.0	9801.00	98.01	10000.0	10340.00	103.4	9591.00	95.91	P
Strontium	100.0	98.14	98.14	100.0	101.30	101.3	96.59	96.59	P
Thallium	100.0	100.50	100.5	100.0	101.60	101.6	95.66	95.66	P
Tin	100.0	103.20	103.2	100.0	101.50	101.5	96.41	96.41	P
Titanium	100.0	99.87	99.87	100.0	100.10	100.1	95.37	95.37	P
Vanadium	100.0	99.33	99.33	100.0	100.20	100.2	95.65	95.65	P
Zinc	100.0	99.32	99.32	100.0	99.52	99.52	95.74	95.74	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN



2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	108.30	108.3	110.30	110.3	P
Antimony	100.0	94.79	94.79	100.0	91.08	91.08	93.01	93.01	P
Arsenic	100.0	96.28	96.28	100.0	94.16	94.16	94.05	94.05	P
Barium	100.0	99.64	99.64	100.0	97.32	97.32	98.48	98.48	P
Beryllium	100.0	98.99	98.99	100.0	93.00	93	93.34	93.34	P
Boron	500.0	519.80	103.96	500.0	480.70	96.14	471.40	94.28	P
Cadmium	100.0	100.20	100.2	100.0	98.89	98.89	99.47	99.47	P
Calcium	10000.0	9632.00	96.32	10000.0	9283.00	92.83	9400.00	94	P
Chromium	100.0	96.50	96.5	100.0	94.06	94.06	92.81	92.81	P
Cobalt	100.0	99.74	99.74	100.0	96.07	96.07	95.04	95.04	P
Copper	100.0	100.70	100.7	100.0	96.38	96.38	97.21	97.21	P
Iron	10000.0	9781.00	97.81	10000.0	9470.00	94.7	9499.00	94.99	P
Lead	100.0	102.90	102.9	100.0	100.50	100.5	101.80	101.8	P
Magnesium	10000.0	9861.00	98.61	10000.0	9438.00	94.38	9284.00	92.84	P
Manganese	100.0	97.42	97.42	100.0	97.35	97.35	95.92	95.92	P
Molybdenum	100.0	97.99	97.99	100.0	93.96	93.96	94.21	94.21	P
Nickel	100.0	99.96	99.96	100.0	95.50	95.5	95.26	95.26	P
Potassium	10000.0	9685.00	96.85	10000.0	9379.00	93.79	9370.00	93.7	P
Selenium	100.0	97.35	97.35	100.0	96.41	96.41	98.22	98.22	P
Silver	100.0	102.60	102.6	100.0	100.30	100.3	100.50	100.5	P
Sodium	10000.0	9801.00	98.01	10000.0	9297.00	92.97	9144.00	91.44	P
Strontium	100.0	98.14	98.14	100.0	98.44	98.44	98.39	98.39	P
Thallium	100.0	100.50	100.5	100.0	98.09	98.09	98.37	98.37	P
Tin	100.0	103.20	103.2	100.0	101.40	101.4	101.80	101.8	P
Titanium	100.0	99.87	99.87	100.0	97.27	97.27	96.32	96.32	P
Vanadium	100.0	99.33	99.33	100.0	98.52	98.52	97.27	97.27	P
Zinc	100.0	99.32	99.32	100.0	94.15	94.15	92.79	92.79	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	109.60	109.6	95.34	95.34	P
Antimony	100.0	94.79	94.79	100.0	97.36	97.36	89.67	89.67	P
Arsenic	100.0	96.28	96.28	100.0	95.64	95.64	91.47	91.47	P
Barium	100.0	99.64	99.64	100.0	98.78	98.78	88.15	88.15	P
Beryllium	100.0	98.99	98.99	100.0	93.66	93.66	83.42	83.42	P
Boron	500.0	519.80	103.96	500.0	467.30	93.46	430.00	86	P
Cadmium	100.0	100.20	100.2	100.0	98.25	98.25	88.37	88.37	P
Calcium	10000.0	9632.00	96.32	10000.0	9537.00	95.37	8512.00	85.12	P
Chromium	100.0	96.50	96.5	100.0	93.84	93.84	88.88	88.88	P
Cobalt	100.0	99.74	99.74	100.0	94.03	94.03	91.22	91.22	P
Copper	100.0	100.70	100.7	100.0	95.92	95.92	83.03	83.03	P
Iron	10000.0	9781.00	97.81	10000.0	9634.00	96.34	8412.00	84.12	P
Lead	100.0	102.90	102.9	100.0	100.00	100	89.37	89.37	P
Magnesium	10000.0	9861.00	98.61	10000.0	9405.00	94.05	8103.00	81.03	P
Manganese	100.0	97.42	97.42	100.0	97.06	97.06	94.10	94.1	P
Molybdenum	100.0	97.99	97.99	100.0	96.03	96.03	84.64	84.64	P
Nickel	100.0	99.96	99.96	100.0	93.96	93.96	80.83	80.83	P
Potassium	10000.0	9685.00	96.85	10000.0	9586.00	95.86	8363.00	83.63	P
Selenium	100.0	97.35	97.35	100.0	99.57	99.57	88.80	88.8	P
Silver	100.0	102.60	102.6	100.0	97.25	97.25	89.51	89.51	P
Sodium	10000.0	9801.00	98.01	10000.0	9374.00	93.74	7938.00	79.38	P
Strontium	100.0	98.14	98.14	100.0	98.04	98.04	90.43	90.43	P
Thallium	100.0	100.50	100.5	100.0	97.16	97.16	86.40	86.4	P
Tin	100.0	103.20	103.2	100.0	96.58	96.58	93.76	93.76	P
Titanium	100.0	99.87	99.87	100.0	95.10	95.1	83.60	83.6	P
Vanadium	100.0	99.33	99.33	100.0	95.86	95.86	93.57	93.57	P
Zinc	100.0	99.32	99.32	100.0	94.42	94.42	89.65	89.65	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	105.40	105.4	103.10	103.1	P
Antimony	100.0	94.79	94.79	100.0	93.53	93.53	93.09	93.09	P
Arsenic	100.0	96.28	96.28	100.0	94.29	94.29	96.14	96.14	P
Barium	100.0	99.64	99.64	100.0	100.20	100.2	99.31	99.31	P
Beryllium	100.0	98.99	98.99	100.0	93.65	93.65	98.77	98.77	P
Boron	500.0	519.80	103.96	500.0	488.00	97.6	500.40	100.08	P
Cadmium	100.0	100.20	100.2	100.0	99.64	99.64	99.64	99.64	P
Calcium	10000.0	9632.00	96.32	10000.0	9373.00	93.73	9678.00	96.78	P
Chromium	100.0	96.50	96.5	100.0	92.79	92.79	94.74	94.74	P
Cobalt	100.0	99.74	99.74	100.0	93.37	93.37	99.08	99.08	P
Copper	100.0	100.70	100.7	100.0	91.90	91.9	99.84	99.84	P
Iron	10000.0	9781.00	97.81	10000.0	9428.00	94.28	9655.00	96.55	P
Lead	100.0	102.90	102.9	100.0	101.50	101.5	100.80	100.8	P
Magnesium	10000.0	9861.00	98.61	10000.0	8932.00	89.32	9805.00	98.05	P
Manganese	100.0	97.42	97.42	100.0	96.49	96.49	96.11	96.11	P
Molybdenum	100.0	97.99	97.99	100.0	94.14	94.14	96.34	96.34	P
Nickel	100.0	99.96	99.96	100.0	90.59	90.59	98.91	98.91	P
Potassium	10000.0	9685.00	96.85	10000.0	9235.00	92.35	9739.00	97.39	P
Selenium	100.0	97.35	97.35	100.0	97.98	97.98	96.27	96.27	P
Silver	100.0	102.60	102.6	100.0	97.76	97.76	102.50	102.5	P
Sodium	10000.0	9801.00	98.01	10000.0	8806.00	88.06	9592.00	95.92	P
Strontium	100.0	98.14	98.14	100.0	100.10	100.1	99.37	99.37	P
Thallium	100.0	100.50	100.5	100.0	98.17	98.17	97.55	97.55	P
Tin	100.0	103.20	103.2	100.0	102.60	102.6	104.70	104.7	P
Titanium	100.0	99.87	99.87	100.0	94.42	94.42	99.41	99.41	P
Vanadium	100.0	99.33	99.33	100.0	96.83	96.83	97.30	97.3	P
Zinc	100.0	99.32	99.32	100.0	93.26	93.26	98.07	98.07	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	113.00	113	91.96	91.96	P
Antimony	100.0	94.79	94.79	100.0	95.53	95.53	95.87	95.87	P
Arsenic	100.0	96.28	96.28	100.0	95.33	95.33	97.49	97.49	P
Barium	100.0	99.64	99.64	100.0	100.00	100	91.82	91.82	P
Beryllium	100.0	98.99	98.99	100.0	99.64	99.64	89.97	89.97	P
Boron	500.0	519.80	103.96	500.0	496.90	99.38	439.60	87.92	P
Cadmium	100.0	100.20	100.2	100.0	99.87	99.87	91.06	91.06	P
Calcium	10000.0	9632.00	96.32	10000.0	10300.00	103	9431.00	94.31	P
Chromium	100.0	96.50	96.5	100.0	95.08	95.08	96.61	96.61	P
Cobalt	100.0	99.74	99.74	100.0	95.72	95.72	97.21	97.21	P
Copper	100.0	100.70	100.7	100.0	99.49	99.49	92.36	92.36	P
Iron	10000.0	9781.00	97.81	10000.0	9891.00	98.91	9166.00	91.66	P
Lead	100.0	102.90	102.9	100.0	98.99	98.99	91.42	91.42	P
Magnesium	10000.0	9861.00	98.61	10000.0	10110.00	101.1	9475.00	94.75	P
Manganese	100.0	97.42	97.42	100.0	99.07	99.07	98.20	98.2	P
Molybdenum	100.0	97.99	97.99	100.0	95.96	95.96	90.69	90.69	P
Nickel	100.0	99.96	99.96	100.0	101.10	101.1	93.10	93.1	P
Potassium	10000.0	9685.00	96.85	10000.0	10340.00	103.4	9591.00	95.91	P
Selenium	100.0	97.35	97.35	100.0	99.09	99.09	91.79	91.79	P
Silver	100.0	102.60	102.6	100.0	97.66	97.66	90.74	90.74	P
Sodium	10000.0	9801.00	98.01	10000.0	10040.00	100.4	9360.00	93.6	P
Strontium	100.0	98.14	98.14	100.0	100.40	100.4	93.58	93.58	P
Thallium	100.0	100.50	100.5	100.0	96.12	96.12	89.64	89.64	P
Tin	100.0	103.20	103.2	100.0	97.02	97.02	89.86	89.86	P
Titanium	100.0	99.87	99.87	100.0	101.90	101.9	94.23	94.23	P
Vanadium	100.0	99.33	99.33	100.0	96.25	96.25	98.41	98.41	P
Zinc	100.0	99.32	99.32	100.0	96.56	96.56	97.79	97.79	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	105.70	105.7	100.30	100.3	P
Antimony	100.0	94.79	94.79	100.0	96.81	96.81	97.48	97.48	P
Arsenic	100.0	96.28	96.28	100.0	98.06	98.06	95.69	95.69	P
Barium	100.0	99.64	99.64	100.0	102.50	102.5	98.32	98.32	P
Beryllium	100.0	98.99	98.99	100.0	101.90	101.9	101.50	101.5	P
Boron	500.0	519.80	103.96	500.0	507.70	101.54	500.30	100.06	P
Cadmium	100.0	100.20	100.2	100.0	103.00	103	99.26	99.26	P
Calcium	10000.0	9632.00	96.32	10000.0	10700.00	107	9802.00	98.02	P
Chromium	100.0	96.50	96.5	100.0	98.02	98.02	96.44	96.44	P
Cobalt	100.0	99.74	99.74	100.0	98.10	98.1	96.61	96.61	P
Copper	100.0	100.70	100.7	100.0	103.60	103.6	101.10	101.1	P
Iron	10000.0	9781.00	97.81	10000.0	10400.00	104	9991.00	99.91	P
Lead	100.0	102.90	102.9	100.0	101.70	101.7	98.49	98.49	P
Magnesium	10000.0	9861.00	98.61	10000.0	10680.00	106.8	9906.00	99.06	P
Manganese	100.0	97.42	97.42	100.0	99.91	99.91	96.90	96.9	P
Molybdenum	100.0	97.99	97.99	100.0	100.90	100.9	97.40	97.4	P
Nickel	100.0	99.96	99.96	100.0	103.90	103.9	100.30	100.3	P
Potassium	10000.0	9685.00	96.85	10000.0	10770.00	107.7	9926.00	99.26	P
Selenium	100.0	97.35	97.35	100.0	104.80	104.8	100.20	100.2	P
Silver	100.0	102.60	102.6	100.0	100.70	100.7	100.50	100.5	P
Sodium	10000.0	9801.00	98.01	10000.0	10600.00	106	9855.00	98.55	P
Strontium	100.0	98.14	98.14	100.0	103.30	103.3	99.29	99.29	P
Thallium	100.0	100.50	100.5	100.0	100.70	100.7	97.89	97.89	P
Tin	100.0	103.20	103.2	100.0	99.39	99.39	99.00	99	P
Titanium	100.0	99.87	99.87	100.0	106.30	106.3	99.91	99.91	P
Vanadium	100.0	99.33	99.33	100.0	98.69	98.69	97.60	97.6	P
Zinc	100.0	99.32	99.32	100.0	96.99	96.99	98.65	98.65	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.70	100.7	100.0	100.60	100.6			P
Antimony	100.0	94.79	94.79	100.0	96.93	96.93			P
Arsenic	100.0	96.28	96.28	100.0	95.27	95.27			P
Barium	100.0	99.64	99.64	100.0	98.93	98.93			P
Beryllium	100.0	98.99	98.99	100.0	100.30	100.3			P
Boron	500.0	519.80	103.96	500.0	492.00	98.4			P
Cadmium	100.0	100.20	100.2	100.0	98.73	98.73			P
Calcium	10000.0	9632.00	96.32	10000.0	9620.00	96.2			P
Chromium	100.0	96.50	96.5	100.0	95.23	95.23			P
Cobalt	100.0	99.74	99.74	100.0	96.69	96.69			P
Copper	100.0	100.70	100.7	100.0	100.00	100			P
Iron	10000.0	9781.00	97.81	10000.0	9923.00	99.23			P
Lead	100.0	102.90	102.9	100.0	98.66	98.66			P
Magnesium	10000.0	9861.00	98.61	10000.0	9714.00	97.14			P
Manganese	100.0	97.42	97.42	100.0	96.06	96.06			P
Molybdenum	100.0	97.99	97.99	100.0	97.20	97.2			P
Nickel	100.0	99.96	99.96	100.0	99.58	99.58			P
Potassium	10000.0	9685.00	96.85	10000.0	9826.00	98.26			P
Selenium	100.0	97.35	97.35	100.0	99.75	99.75			P
Silver	100.0	102.60	102.6	100.0	101.00	101			P
Sodium	10000.0	9801.00	98.01	10000.0	9758.00	97.58			P
Strontium	100.0	98.14	98.14	100.0	99.62	99.62			P
Thallium	100.0	100.50	100.5	100.0	97.97	97.97			P
Tin	100.0	103.20	103.2	100.0	99.26	99.26			P
Titanium	100.0	99.87	99.87	100.0	100.10	100.1			P
Vanadium	100.0	99.33	99.33	100.0	96.54	96.54			P
Zinc	100.0	99.32	99.32	100.0	98.19	98.19			P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080227A

Continuing Calibration Source:

Start: 2/27/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Lithium	100.0	97.33	97.33	100.0	95.50	95.5	95.64	95.64	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080227A

Continuing Calibration Source:

Start: 2/27/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Lithium	100.0	97.33	97.33	100.0	94.25	94.25	96.51	96.51	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN



2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: ICP7500 080227A

Continuing Calibration Source:

Start: 2/27/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Lithium	100.0	97.33	97.33	100.0	96.80	96.8			P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L) C		Continuing Calibration Blank (ug/L)						Prepa- ration Blank C		M
	1	C	2	C	3	C					
Aluminum	-3.2		-0.8		2.0	J	31.0		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc. Contract: \_\_\_\_\_

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.: \_\_\_\_\_ SDG No.: 0802304

Preparation Blank Matrix (soil/water): WATER Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): \_\_\_\_\_

Analyte	Initial Calib. Blank (ug/L) C		Continuing Calibration Blank (ug/L)						Prepa- ration Blank C		M
	1	C	2	C	3	C					
Aluminum	-3.2		30.2		9.6	J	4.0	J	0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
	C		1	C	2	C	3	C	C		
Aluminum	-3.2		10.6		16.6		25.5		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc. Contract: \_\_\_\_\_

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.: \_\_\_\_\_ SDG No.: 0802304

Preparation Blank Matrix (soil/water): WATER Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): \_\_\_\_\_

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	-3.2		18.8		7.2	J	33.2		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc. Contract: \_\_\_\_\_

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.: \_\_\_\_\_ SDG No.: 0802304

Preparation Blank Matrix (soil/water): WATER Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): \_\_\_\_\_

Analyte	Initial Calib. Blank (ug/L) C		Continuing Calibration Blank (ug/L)						Prepa- ration Blank C		M
			1 C	2 C	3 C						
Aluminum	-3.2		17.3						0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	5.9		0.1		0.1		0.1		0.000		P
Arsenic	0.4		0.1		0.3		0.3		0.000		P
Barium	2.2	J	1.6	J	1.6	J	1.8	J	0.176		P
Beryllium	0.3		0.0		0.0		0.0		0.000		P
Boron	19.5	J	1.7		0.2		0.6		0.000		P
Cadmium	0.2	J	0.0		0.0		0.0		0.000		P
Calcium	-31.9		-21.0		-2.3		207.0	J	0.000		P
Chromium	0.3		0.0		0.0		0.1		0.000		P
Cobalt	0.1	J	0.0		0.0		0.0		0.000		P
Copper	0.6	J	0.4	J	0.2		0.6	J	0.230		P
Iron	27.2	J	40.7	J	17.6		57.2	J	0.000		P
Lead	0.2	J	0.1		0.0		0.4	J	0.000		P
Magnesium	24.9		0.9		1.9		10.7		0.000		P
Manganese	0.1		0.2		0.1		0.8		0.000		P
Molybdenum	1.0		0.1		0.1		0.1		0.000		P
Nickel	0.7	J	0.5	J	0.5	J	0.6	J	0.000		P
Potassium	0.5		-18.0		-21.0		-9.3		0.000		P
Selenium	1.7		2.3	J	2.1	J	2.0	J	0.253		P
Silver	1.2	J	1.0	J	1.0	J	1.0	J	0.102		P
Sodium	-127.2		-260.0		-270.0		-320.0		0.000		P
Strontium	0.2		0.3		0.4		0.6	J	0.000		P
Thallium	0.2		0.2		0.0		0.0		0.000		P
Tin	0.4		0.0		0.0		0.0		1.129		P
Titanium	0.2		0.0		0.1		0.3		0.000		P
Vanadium	1.0	J	0.8	J	1.1	J	1.2	J	0.149		P
Zinc	-2.8		-3.2		-3.7		-1.6		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	5.9		0.1		0.1		0.2		0.000		P
Arsenic	0.4		0.2		0.3		0.3		0.000		P
Barium	2.2	J	1.9	J	2.4	J	2.1	J	0.176		P
Beryllium	0.3		0.0		0.0		0.0		0.000		P
Boron	19.5	J	0.8		0.5		2.0		0.000		P
Cadmium	0.2	J	0.0		0.0		0.0		0.000		P
Calcium	-31.9		98.0	J	-71.0		-96.0		0.000		P
Chromium	0.3		0.1		0.1		0.1		0.000		P
Cobalt	0.1	J	0.0		0.0		0.0		0.000		P
Copper	0.6	J	0.5	J	0.0		0.1		0.230		P
Iron	27.2	J	62.1	J	39.9	J	33.1	J	0.000		P
Lead	0.2	J	0.1		0.0		0.0		0.000		P
Magnesium	24.9		12.9		6.2		5.5		0.000		P
Manganese	0.1		0.6		0.1		0.1		0.000		P
Molybdenum	1.0		0.0		0.0		0.1		0.000		P
Nickel	0.7	J	0.6	J	0.4	J	0.4	J	0.000		P
Potassium	0.5		1.7		-4.0		0.0		0.000		P
Selenium	1.7		2.4	J	2.1	J	2.6	J	0.253		P
Silver	1.2	J	1.0	J	1.0	J	1.1	J	0.102		P
Sodium	-127.2		-320.0		-330.0		-330.0		0.000		P
Strontium	0.2		0.4	J	0.2		0.1		0.000		P
Thallium	0.2		0.0		0.0		0.3		0.000		P
Tin	0.4		0.0		0.0		0.1		1.129		P
Titanium	0.2		2.0	J	0.3		0.1		0.000		P
Vanadium	1.0	J	1.1	J	1.2	J	1.0	J	0.149		P
Zinc	-2.8		-1.9		-3.9		-3.9		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN



3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	5.9		0.2		3.2	J	-0.8		0.000		P
Arsenic	0.4		0.3		0.5		0.0		0.000		P
Barium	2.2	J	1.7	J	2.2	J	1.4	J	0.176		P
Beryllium	0.3		0.0		0.8	J	0.0		0.000		P
Boron	19.5	J	0.4		22.9		-3.7		0.000		P
Cadmium	0.2	J	0.0		0.8	J	0.0		0.000		P
Calcium	-31.9		424.0	J	248.0	J	6.0		0.000		P
Chromium	0.3		0.0		-1.3		-1.9		0.000		P
Cobalt	0.1	J	0.0		0.6	J	0.0		0.000		P
Copper	0.6	J	0.2		1.5	J	0.7	J	0.230		P
Iron	27.2	J	57.6	J	104.0	J	11.5		0.000		P
Lead	0.2	J	0.0		1.0	J	0.1		0.000		P
Magnesium	24.9		11.6		96.4	J	6.7		0.000		P
Manganese	0.1		0.3		1.0		0.3		0.000		P
Molybdenum	1.0		0.0		2.0	J	-0.2		0.000		P
Nickel	0.7	J	0.5	J	0.9	J	0.2		0.000		P
Potassium	0.5		17.2		82.4	J	-7.0		0.000		P
Selenium	1.7		2.8	J	1.6		0.7		0.253		P
Silver	1.2	J	1.0	J	1.2	J	0.4	J	0.102		P
Sodium	-127.2		-320.0		90.2	J	-4.0		0.000		P
Strontium	0.2		1.0	J	1.1	J	0.0		0.000		P
Thallium	0.2		0.0		1.3	J	0.1		0.000		P
Tin	0.4		0.0		1.1	J	-0.1		1.129		P
Titanium	0.2		0.3		1.0	J	0.3		0.000		P
Vanadium	1.0	J	1.2	J	1.1	J	0.5	J	0.149		P
Zinc	-2.8		-4.0		0.8		0.1		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	5.9		-0.7		-0.8		-0.8		0.000		P
Arsenic	0.4		0.0		0.0		0.0		0.000		P
Barium	2.2	J	1.4	J	1.3	J	1.6	J	0.176		P
Beryllium	0.3		0.0		0.0		0.0		0.000		P
Boron	19.5	J	-3.8		-2.9		-3.0		0.000		P
Cadmium	0.2	J	0.0		0.0		0.0		0.000		P
Calcium	-31.9		22.3		-42.0		-5.9		0.000		P
Chromium	0.3		-1.9		-1.9		-1.9		0.000		P
Cobalt	0.1	J	0.0		0.0		0.0		0.000		P
Copper	0.6	J	0.6	J	0.6	J	0.6	J	0.230		P
Iron	27.2	J	5.0		-7.7		27.9	J	0.000		P
Lead	0.2	J	0.0		0.1		0.1		0.000		P
Magnesium	24.9		7.4		0.3		11.3		0.000		P
Manganese	0.1		0.0		0.0		0.6		0.000		P
Molybdenum	1.0		-0.2		-0.1		-0.1		0.000		P
Nickel	0.7	J	0.1		0.2		0.2		0.000		P
Potassium	0.5		-2.0		-9.4		-3.6		0.000		P
Selenium	1.7		1.0		1.1		1.4		0.253		P
Silver	1.2	J	0.4	J	0.4	J	0.4	J	0.102		P
Sodium	-127.2		-6.9		-12.0		-3.0		0.000		P
Strontium	0.2		0.1		0.0		0.1		0.000		P
Thallium	0.2		0.0		0.0		0.0		0.000		P
Tin	0.4		0.1		-0.1		-0.1		1.129		P
Titanium	0.2		0.3		0.0		0.2		0.000		P
Vanadium	1.0	J	0.6	J	0.5	J	0.6	J	0.149		P
Zinc	-2.8		-1.0		-0.1		-0.1		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	5.9		-0.8						0.000		P
Arsenic	0.4		-0.1						0.000		P
Barium	2.2	J	1.4	J					0.176		P
Beryllium	0.3		0.0						0.000		P
Boron	19.5	J	-3.8						0.000		P
Cadmium	0.2	J	0.0						0.000		P
Calcium	-31.9		-30.0						0.000		P
Chromium	0.3		-1.9						0.000		P
Cobalt	0.1	J	0.0						0.000		P
Copper	0.6	J	0.6	J					0.230		P
Iron	27.2	J	6.3						0.000		P
Lead	0.2	J	0.0						0.000		P
Magnesium	24.9		3.3						0.000		P
Manganese	0.1		0.2						0.000		P
Molybdenum	1.0		-0.2						0.000		P
Nickel	0.7	J	0.1						0.000		P
Potassium	0.5		-8.0						0.000		P
Selenium	1.7		1.2						0.253		P
Silver	1.2	J	0.4	J					0.102		P
Sodium	-127.2		-10.0						0.000		P
Strontium	0.2		0.0						0.000		P
Thallium	0.2		-0.1						0.000		P
Tin	0.4		-0.1						1.129		P
Titanium	0.2		0.1						0.000		P
Vanadium	1.0	J	0.6	J					0.149		P
Zinc	-2.8		0.1						0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	-0.1		-0.4		-0.4		-0.1		0.000		P
Arsenic	0.0		0.0		0.0		0.0		0.000		P
Barium	1.4	J	1.3	J	1.3	J	1.2	J	0.000		P
Beryllium	0.2		0.0		0.0		0.0		0.000		P
Boron	-4.0		-6.2		-8.5		-8.8		0.000		P
Cadmium	0.2	J	0.0		0.0		0.0		0.000		P
Calcium	119.1	J	4.0		-11.0		6.4		0.000		P
Chromium	-1.8		-1.9		-1.8		-1.8		0.000		P
Cobalt	0.2	J	0.0		0.0		0.0		0.000		P
Copper	1.3	J	0.7	J	0.8	J	0.8	J	0.000		P
Iron	9.1		2.4		6.0		6.4		0.000		P
Lead	0.1		0.0		0.0		0.0		0.000		P
Magnesium	21.4		1.2		0.3		2.6		0.000		P
Manganese	0.1		0.0		0.0		0.0		0.000		P
Molybdenum	0.0		-0.2		-0.3		-0.1		0.000		P
Nickel	0.6	J	0.4	J	0.4	J	0.4	J	0.000		P
Potassium	16.2		-2.5		-5.7		-2.2		0.000		P
Selenium	2.1	J	2.2	J	2.1	J	2.6	J	0.000		P
Silver	0.9	J	0.8	J	0.8	J	0.8	J	0.000		P
Sodium	13.9		-13.0		-26.0		-39.0		0.000		P
Strontium	0.4		0.1		0.1		0.1		0.000		P
Thallium	0.0		-0.1		-0.2		-0.2		0.000		P
Tin	0.1		-0.1		-0.1		-0.1		0.000		P
Titanium	-0.8		-0.9		-0.9		-0.9		0.000		P
Vanadium	0.6	J	0.6	J	0.5	J	0.7	J	0.000		P
Zinc	2.6	J	0.9		1.1		1.1		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	-0.1		-0.4		-0.2		-0.2		0.000		P
Arsenic	0.0		0.1		0.3		0.5		0.000		P
Barium	1.4	J	1.4	J	1.8	J	1.8	J	0.000		P
Beryllium	0.2		0.0		0.2		0.2		0.000		P
Boron	-4.0		-9.0		-8.0		-8.6		0.000		P
Cadmium	0.2	J	0.0		0.2	J	0.1		0.000		P
Calcium	119.1	J	-26.0		82.1	J	75.0		0.000		P
Chromium	-1.8		-1.9		-1.7		-1.7		0.000		P
Cobalt	0.2	J	0.0		0.1	J	0.1	J	0.000		P
Copper	1.3	J	0.6	J	1.2	J	1.1	J	0.000		P
Iron	9.1		-4.9		41.7	J	26.4	J	0.000		P
Lead	0.1		0.0		0.2	J	0.2		0.000		P
Magnesium	21.4		-0.4		27.8	J	23.8		0.000		P
Manganese	0.1		0.6		0.3		0.2		0.000		P
Molybdenum	0.0		-0.3		-0.1		0.0		0.000		P
Nickel	0.6	J	0.4	J	0.6	J	0.6	J	0.000		P
Potassium	16.2		-11.0		10.4		2.1		0.000		P
Selenium	2.1	J	2.4	J	2.2	J	2.2	J	0.000		P
Silver	0.9	J	0.8	J	0.9	J	0.9	J	0.000		P
Sodium	13.9		-57.0		-42.0		-52.0		0.000		P
Strontium	0.4		0.0		0.4	J	0.4		0.000		P
Thallium	0.0		-0.2		0.0		0.2		0.000		P
Tin	0.1		-0.1		0.1		0.1		0.000		P
Titanium	-0.8		-1.0		-0.5		-0.1		0.000		P
Vanadium	0.6	J	0.6	J	1.2	J	1.2	J	0.000		P
Zinc	2.6	J	1.7	J	2.4	J	2.5	J	0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Antimony	-0.1		-0.3		-0.1		0.9		0.000		P
Arsenic	0.0		0.0		0.2		0.3		0.000		P
Barium	1.4	J	1.7	J	2.2	J	2.3	J	0.000		P
Beryllium	0.2		0.0		0.2		0.8	J	0.000		P
Boron	-4.0		-8.5		-7.4		20.1		0.000		P
Cadmium	0.2	J	0.0		0.1		0.8	J	0.000		P
Calcium	119.1	J	-22.0		584.0		242.0	J	0.000		P
Chromium	-1.8		-1.8		-1.7		-1.4		0.000		P
Cobalt	0.2	J	0.0		0.2	J	0.4	J	0.000		P
Copper	1.3	J	0.7	J	1.1	J	1.3	J	0.000		P
Iron	9.1		51.4	J	51.1	J	81.3	J	0.000		P
Lead	0.1		0.1		0.2	J	1.0	J	0.000		P
Magnesium	21.4		7.1		32.1	J	94.3	J	0.000		P
Manganese	0.1		0.4		0.5		0.8		0.000		P
Molybdenum	0.0		-0.1		-0.1		2.1	J	0.000		P
Nickel	0.6	J	0.5	J	0.6	J	1.2	J	0.000		P
Potassium	16.2		-4.6		17.3		67.3	J	0.000		P
Selenium	2.1	J	3.2	J	2.9	J	1.4		0.000		P
Silver	0.9	J	0.8	J	0.9	J	1.4	J	0.000		P
Sodium	13.9		-70.0		-52.0		76.1	J	0.000		P
Strontium	0.4		0.1		1.2	J	1.0	J	0.000		P
Thallium	0.0		0.2		0.1		1.5	J	0.000		P
Tin	0.1		-0.1		0.1		1.1	J	0.000		P
Titanium	-0.8		-0.8		0.0		1.0	J	0.000		P
Vanadium	0.6	J	0.8	J	0.9	J	1.0	J	0.000		P
Zinc	2.6	J	1.7	J	2.4	J	1.5	J	0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	-0.1		-0.3		-0.3		1.1	J	0.000		P
Arsenic	0.0		-0.1		-0.1		0.4		0.000		P
Barium	1.4	J	3.0	J	1.2	J	2.6	J	0.000		P
Beryllium	0.2		0.0		0.0		0.8	J	0.000		P
Boron	-4.0		-2.8		-1.9		24.0		0.000		P
Cadmium	0.2	J	0.0		0.0		0.8	J	0.000		P
Calcium	119.1	J	385.0	J	56.9		281.0	J	0.000		P
Chromium	-1.8		-1.8		-1.9		-1.2		0.000		P
Cobalt	0.2	J	0.0		0.0		0.5	J	0.000		P
Copper	1.3	J	0.6	J	0.6	J	1.8	J	0.000		P
Iron	9.1		60.8	J	10.6		108.0	J	0.000		P
Lead	0.1		0.2		0.1		1.0	J	0.000		P
Magnesium	21.4		38.4	J	2.0		101.0	J	0.000		P
Manganese	0.1		8.5		0.5		1.4	J	0.000		P
Molybdenum	0.0		-0.1		0.0		2.1	J	0.000		P
Nickel	0.6	J	0.4	J	0.3	J	1.4	J	0.000		P
Potassium	16.2		7.3		10.7		89.5	J	0.000		P
Selenium	2.1	J	2.1	J	2.5	J	2.7	J	0.000		P
Silver	0.9	J	0.7	J	0.7	J	1.6	J	0.000		P
Sodium	13.9		-12.0		-4.6		94.4	J	0.000		P
Strontium	0.4		0.4	J	0.1		1.1	J	0.000		P
Thallium	0.0		-0.1		0.0		1.7	J	0.000		P
Tin	0.1		-0.1		-0.1		1.1	J	0.000		P
Titanium	-0.8		0.3		0.0		1.1	J	0.000		P
Vanadium	0.6	J	0.8	J	0.7	J	1.2	J	0.000		P
Zinc	2.6	J	1.6	J	1.5	J	1.7	J	0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): WATER

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	-0.1		-0.1						0.000		P
Arsenic	0.0		0.1						0.000		P
Barium	1.4	J	1.5	J					0.000		P
Beryllium	0.2		0.0						0.000		P
Boron	-4.0		-2.6						0.000		P
Cadmium	0.2	J	-0.1						0.000		P
Calcium	119.1	J	20.2						0.000		P
Chromium	-1.8		-1.7						0.000		P
Cobalt	0.2	J	-0.1						0.000		P
Copper	1.3	J	1.0	J					0.000		P
Iron	9.1		-5.7						0.000		P
Lead	0.1		0.0						0.000		P
Magnesium	21.4		-1.8						0.000		P
Manganese	0.1		0.2						0.000		P
Molybdenum	0.0		-0.2						0.000		P
Nickel	0.6	J	0.6	J					0.000		P
Potassium	16.2		-4.9						0.000		P
Selenium	2.1	J	1.6						0.000		P
Silver	0.9	J	0.8	J					0.000		P
Sodium	13.9		-1.4						0.000		P
Strontium	0.4		0.0						0.000		P
Thallium	0.0		-0.2						0.000		P
Tin	0.1		-0.1						0.000		P
Titanium	-0.8		-0.1						0.000		P
Vanadium	0.6	J	1.3	J					0.000		P
Zinc	2.6	J	1.9	J					0.000		P

Note: MDLs are used, not IDLs

FORM III - IN



3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L) C		Continuing Calibration Blank (ug/L)						Prepa- ration Blank C		M
	1	C	2	C	3	C					
Aluminum	4.6	J	4.2	J	3.7	J	4.0	J	0.633		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	4.6	J	3.9	J	27.8		26.9		0.633		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	4.6	J	45.1		32.5		20.7		0.633		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	4.6	J	46.7		5.3	J	28.2		0.633		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080221A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
	C		1	C	2	C	3	C	C		
Aluminum	4.6	J	8.0	J					0.633		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802304

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080227A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L) C		Continuing Calibration Blank (ug/L)						Prepa- ration Blank C		M
			1	C	2	C	3	C			
Lithium	-0.4		-0.8		-0.8		-0.8		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc. Contract: \_\_\_\_\_

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.: \_\_\_\_\_ SDG No.: 0802304

Preparation Blank Matrix (soil/water): SOIL Run: ICP7500 080227A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Lithium	-0.4		-0.7		-0.8				0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

Last Calib: Feb 28, 2008 12:10 pm  
 Calibration Type: External Calibration Method  
 Calibration Title: ICP\_OR.S  
 Weighting Method: 1/(SD\*SD)  
 Mass Interpolation Fit for VIS: Point to Point  
 Method: C:\ICPCHEM\1\METHODS\ICP\_OR.S.M  
 Multi Tune: #1 012807a5.u  
 #2 012807ha.u

## === Standard Files ===

## &lt;Data Correction&gt;

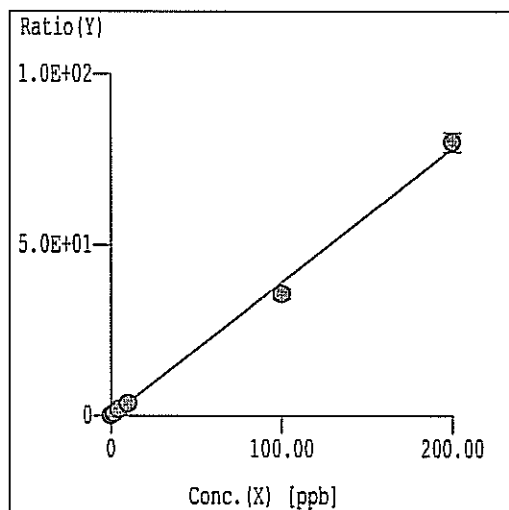
Bkg File: —  
 Rejected Masses: —  
 Interference Correction: ON

	Data File	Sample Name	Date Acquired
1	c:\icpchem\1\data\08b20m00.b\003calb.d\003calb.d#	CAL BLK	Feb 20 2008 12:23 pm
2	c:\icpchem\1\data\08b20m00.b\004cals.d\004cals.d#	2/10/200	Feb 20 2008 12:29 pm
3	c:\icpchem\1\data\08b20m00.b\005cals.d\005cals.d#	5/25/500	Feb 20 2008 12:35 pm
4	c:\icpchem\1\data\08b20m00.b\006cals.d\006cals.d#	10/50/1000	Feb 20 2008 12:41 pm
5	c:\icpchem\1\data\08b20m00.b\007cals.d\007cals.d#	100/500/10K	Feb 20 2008 12:47 pm
6	c:\icpchem\1\data\08b20m00.b\008cals.d\008cals.d#	200/1000/20K	Feb 20 2008 12:53 pm
7	---		
8	---		
9	---		
10	---		
11	---		
12	---		
13	---		
14	---		
15	---		
16	---		
17	---		
18	---		
19	---		
20	---		



## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 9 Be                    6       ppb

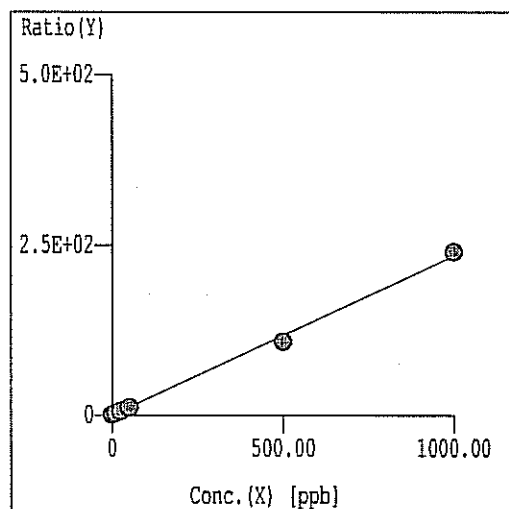


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	3.333	1.759E-03	P	102.0
2		2.000	1.889	1448	7.407E-01	P	1.467
3		5.000	4.891	3699	1.916E+00	P	3.527
4		10.00	9.195	7071	3.600E+00	P	6.675
5		100.0	91.14	7.014E+04	3.566E+01	P	4.152
6		200.0	204.5	1.439E+05	8.001E+01	P	3.484
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9986$   
 $Y = 3.913E-001 \cdot X + 1.759E-003$   
 $X = 2.556E+000 \cdot Y - 4.495E-003$   
 $DL = 1.375E-02$  ppb  
 $BEC = 4.495E-03$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 11 B                    6       ppb



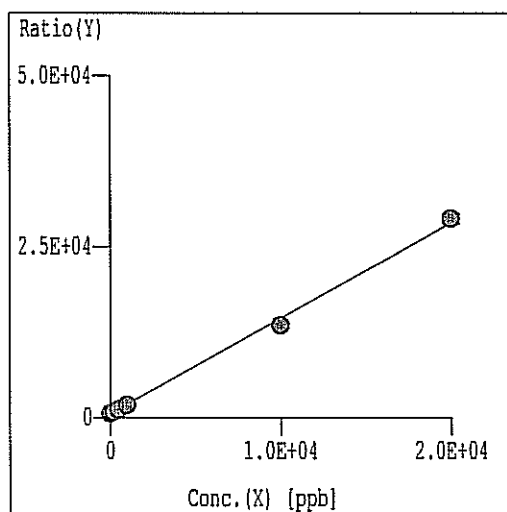
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	754.5	3.870E-01	P	7.702
2		10.00	9.211	4981	2.550E+00	P	3.926
3		25.00	23.31	1.131E+04	5.861E+00	P	3.231
4		50.00	45.88	2.194E+04	1.116E+01	P	4.728
5		500.0	458.3	2.126E+05	1.080E+02	P	2.369
6		1000	1021	4.322E+05	2.402E+02	P	1.538
7		250.0					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9988$   
 $Y = 2.348E-001 \cdot X + 3.870E-001$   
 $X = 4.258E+000 \cdot Y - 1.648E+000$   
 $DL = 3.807E-01$  ppb  
 $BEC = 1.648$  ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD      Unit  
(1) 23 Na                72        ppb

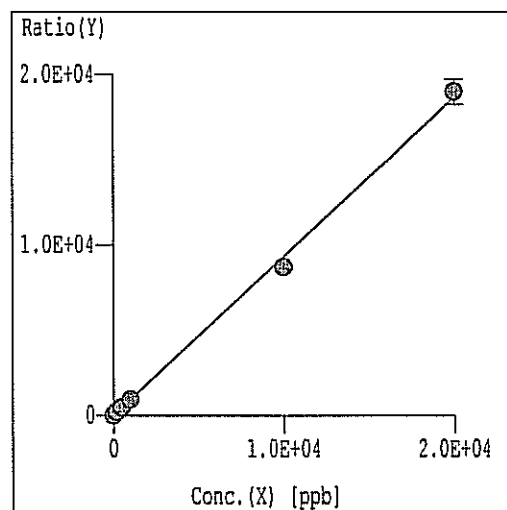


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	9.979E+05	5.651E+02	A	4.091
2		200.0	189.1	1.476E+06	8.297E+02	A	3.485
3		500.0	436.2	2.167E+06	1.175E+03	A	3.691
4		1000	904.7	3.453E+06	1.831E+03	A	2.464
5		1.000E+04	9231	2.592E+07	1.348E+04	A	2.435
6		2.000E+04	2.039E+04	5.228E+07	2.909E+04	A	2.520
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9990$   
 $Y = 1.399E+000 * X + 5.651E+002$   
 $X = 7.147E-001 * Y - 4.039E+002$   
DL = 49.57 ppb  
BEC = 403.9 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD      Unit  
(1) 24 Mg                72        ppb



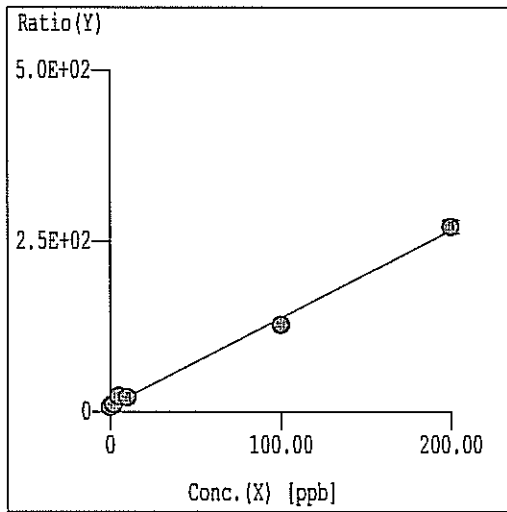
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	3240	1.848E+00	P	34.34
2		200.0	226.8	3.800E+05	2.136E+02	P	4.438
3		500.0	504.7	8.719E+05	4.730E+02	A	3.874
4		1000	994.6	1.755E+06	9.304E+02	A	1.495
5		1.000E+04	9315	1.673E+07	8.698E+03	A	1.059
6		2.000E+04	2.034E+04	3.412E+07	1.899E+04	A	3.906
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9992$   
 $Y = 9.336E-001 * X + 1.848E+000$   
 $X = 1.071E+000 * Y - 1.980E+000$   
DL = 2.040 ppb  
BEC = 1.980 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 27 Al                72     ppb

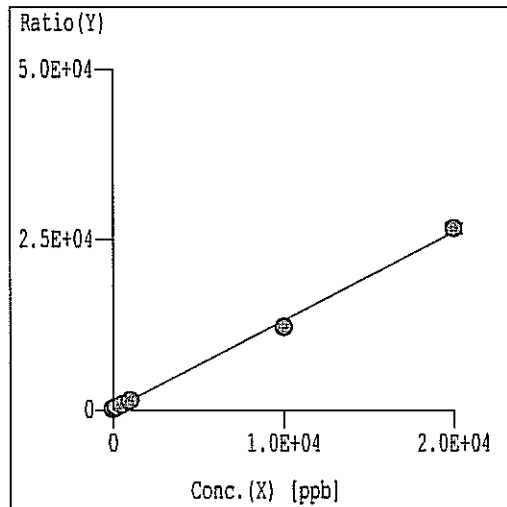


	Rjct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	-1.440E+00	1.183E+04	6.743E+00	P	30.60
2		2.000	2.001	1.982E+04	1.117E+01	P	18.14
3		5.000	11.12	4.202E+04	2.290E+01	P	24.95
4		10.00	9.484	3.915E+04	2.080E+01	P	11.40
5		100.0	91.93	2.440E+05	1.269E+02	P	2.423
6		200.0	203.9	4.867E+05	2.710E+02	P	3.629
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9982$   
 $Y = 1.287E+000 \cdot X + 8.596E+000$   
 $X = 7.772E-001 \cdot Y - 6.680E+000$   
DL = 4.811 ppb  
BEC = 6.680 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 39 K                72     ppb



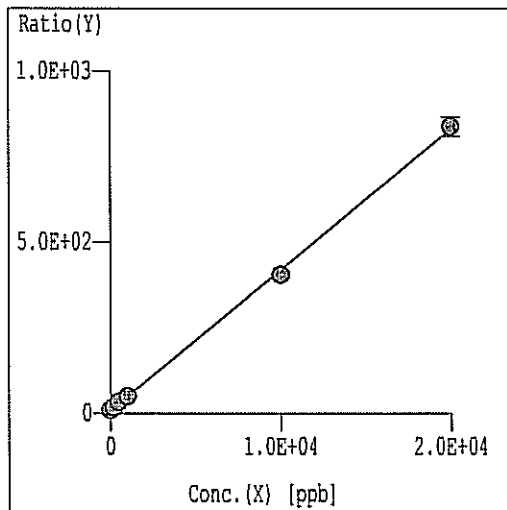
	Rjct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	2.733E+05	1.548E+02	P	4.489
2		200.0	219.5	7.830E+05	4.400E+02	P	3.004
3		500.0	486.3	1.450E+06	7.867E+02	A	4.478
4		1000	956.5	2.636E+06	1.398E+03	A	2.406
5		1.000E+04	9227	2.336E+07	1.215E+04	A	1.690
6		2.000E+04	2.039E+04	4.788E+07	2.665E+04	A	2.973
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9990$   
 $Y = 1.299E+000 \cdot X + 1.548E+002$   
 $X = 7.695E-001 \cdot Y - 1.191E+002$   
DL = 16.04 ppb  
BEC = 119.1 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 44 Ca                72     ppb

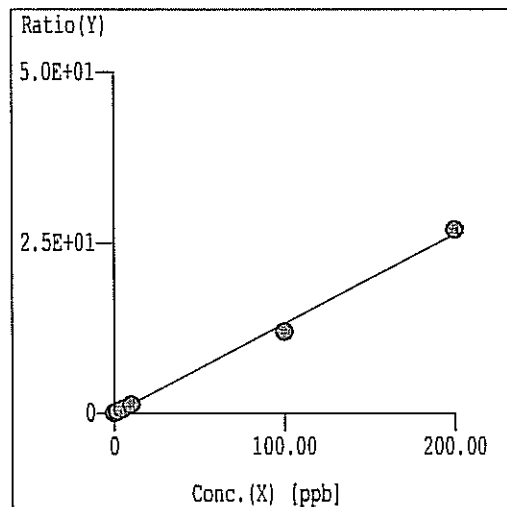


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	1.562E+04	8.859E+00	P	11.55
2		200.0	226.7	3.232E+04	1.817E+01	P	7.313
3		500.0	602.9	6.190E+04	3.363E+01	P	10.87
4		1000	989.7	9.336E+04	4.952E+01	P	4.376
5		1.000E+04	9628	7.777E+05	4.045E+02	P	2.247
6		2.000E+04	2.018E+04	1.506E+06	8.382E+02	A	3.382
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9997$   
 $Y = 4.109E-002 * X + 8.859E+000$   
 $X = 2.434E+001 * Y - 2.156E+002$   
DL = 74.70 ppb  
BEC = 215.6 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 47 Ti                72     ppb



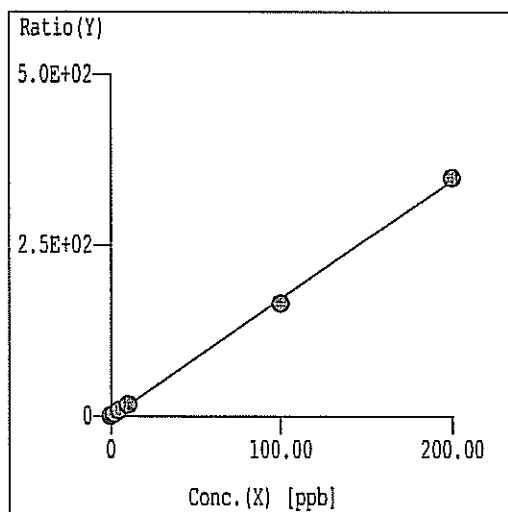
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	32.23	1.847E-02	P	60.22
2		2.000	2.075	518.9	2.913E-01	P	9.194
3		5.000	4.743	1185	6.421E-01	P	4.643
4		10.00	9.499	2389	1.267E+00	P	5.043
5		100.0	90.62	2.295E+04	1.193E+01	P	1.432
6		200.0	204.7	4.840E+04	2.694E+01	P	1.859
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9985$   
 $Y = 1.315E-001 * X + 1.847E-002$   
 $X = 7.605E+000 * Y - 1.405E-001$   
DL = 2.538E-01 ppb  
BEC = 1.405E-01 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 51 V                72    ppb

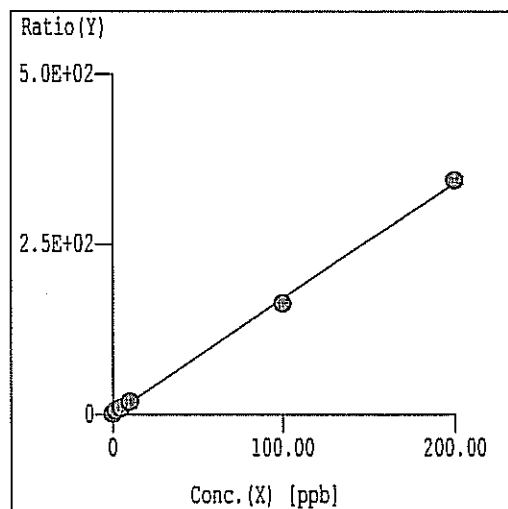


	Rt	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	7.749E-01	258.9	4.183E-01	P	21.09
2		2.000	2.600	2277	3.576E+00	P	3.313
3		5.000	5.582	5611	8.736E+00	P	1.265
4		10.00	10.23	1.113E+04	1.678E+01	P	2.280
5		100.0	95.69	1.105E+05	1.646E+02	P	4.247E-01
6		200.0	202.1	2.237E+05	3.488E+02	P	6.184E-01
7		50.00					
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9							
10							
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16							
17							
18							
19							
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Curve Fit:  $Y=aX+b$   
 $r = 0.9996$   
 $Y = 1.730E+000 \cdot X - 9.222E-001$   
 $X = 5.780E-001 \cdot Y + 5.331E-001$   
 $DL = 1.530E-01$  ppb  
 $BEC = -5.331E-01$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 52 Cr                72    ppb



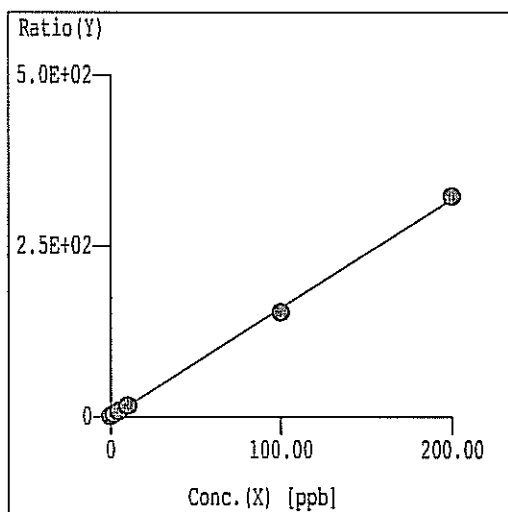
	Rt	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	595.6	9.606E-01	P	10.98
2		2.000	2.831	3663	5.756E+00	P	2.327
3		5.000	5.017	6076	9.460E+00	P	2.258
4		10.00	10.41	1.234E+04	1.860E+01	P	1.683
5		100.0	95.36	1.091E+05	1.625E+02	P	5.113E-01
6		200.0	202.3	2.204E+05	3.437E+02	P	1.661
7		50.00					
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18							
19							
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Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9996$   
 $Y = 1.694E+000 \cdot X + 9.606E-001$   
 $X = 5.903E-001 \cdot Y - 5.670E-001$   
 $DL = 1.868E-01$  ppb  
 $BEC = 5.670E-01$  ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 55 Mn                72     ppb

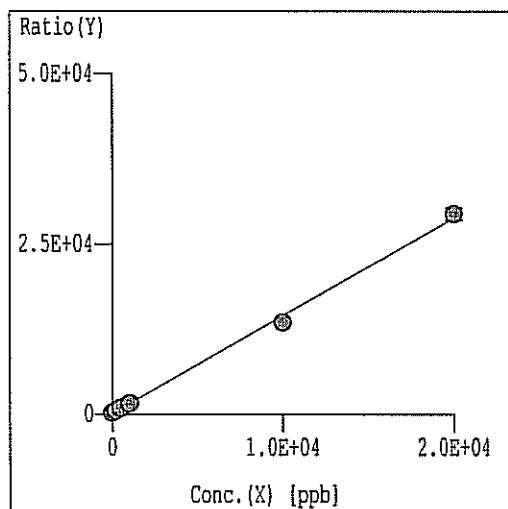


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	223.3	3.598E-01	P	8.489
2		2.000	2.129	2386	3.753E+00	P	9.986
3		5.000	4.911	5260	8.189E+00	P	1.288
4		10.00	9.832	1.064E+04	1.603E+01	P	1.579
5		100.0	95.80	1.027E+05	1.531E+02	P	6.114E-01
6		200.0	202.1	2.069E+05	3.225E+02	P	1.095
7		50.00					
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Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9997$   
 $Y = 1.594E+000 \cdot X + 3.598E-001$   
 $X = 6.274E-001 \cdot Y - 2.257E-001$   
DL = 5.749E-02 ppb  
BEC = 2.257E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 56 Fe                72     ppb



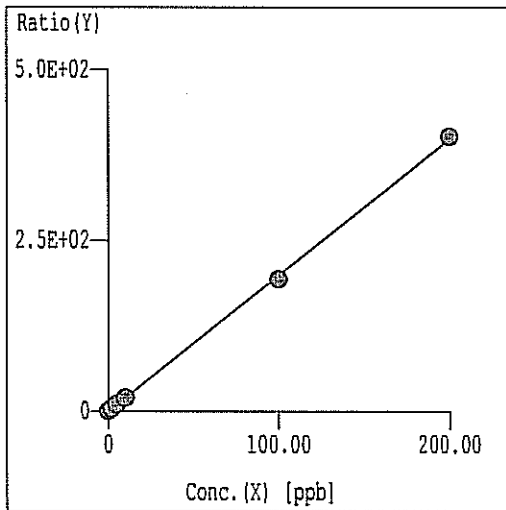
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	3.285E+05	1.861E+02	P	7.005
2		200.0	203.5	8.512E+05	4.783E+02	A	2.912
3		500.0	504.2	1.678E+06	9.100E+02	A	2.787
4		1000	972.1	2.982E+06	1.582E+03	A	3.360
5		1.000E+04	9266	2.595E+07	1.349E+04	A	1.139E-01
6		2.000E+04	2.037E+04	5.287E+07	2.943E+04	A	3.055
7		5000					
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Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9991$   
 $Y = 1.436E+000 \cdot X + 1.861E+002$   
 $X = 6.965E-001 \cdot Y - 1.296E+002$   
DL = 27.25 ppb  
BEC = 129.6 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 59 Co                72    ppb

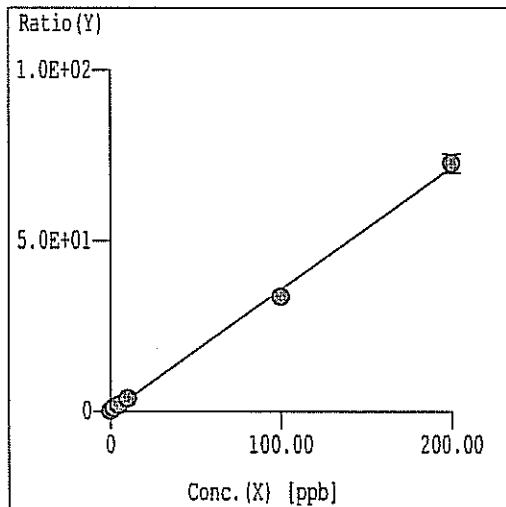


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	13.33	2.149E-02	P	24.86
2		2.000	1.979	2526	3.966E+00	P	3.662
3		5.000	5.075	6513	1.014E+01	P	2.300
4		10.00	9.802	1.298E+04	1.956E+01	P	3.301
5		100.0	96.92	1.297E+05	1.932E+02	P	9.118E-01
6		200.0	201.5	2.577E+05	4.017E+02	P	4.764E-01
7		50.00					
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Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9998$   
 $Y = 1.993E+000 * X + 2.149E-002$   
 $X = 5.018E-001 * Y - 1.078E-002$   
 $DL = 8.041E-03 \text{ ppb}$   
 $BEC = 1.078E-02 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 60 Ni                72    ppb



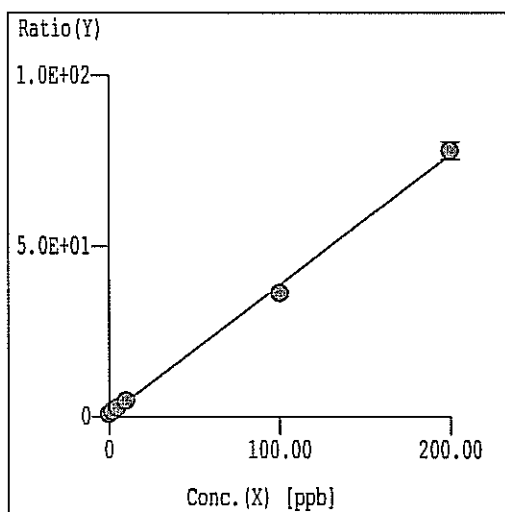
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	5.550E-01	161.1	9.153E-02	P	17.67
2		2.000	3.159	1826	1.025E+00	P	1.857
3		5.000	5.613	3512	1.906E+00	P	7.160
4		10.00	10.82	7115	3.772E+00	P	1.026
5		100.0	93.85	6.453E+04	3.356E+01	P	1.578
6		200.0	203.0	1.306E+05	7.271E+01	P	3.780
7		50.00					
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Curve Fit:       $Y = aX + b$   
 $r = 0.9993$   
 $Y = 3.587E-001 * X - 1.076E-001$   
 $X = 2.788E+000 * Y + 2.998E-001$   
 $DL = 1.353E-01 \text{ ppb}$   
 $BEC = -2.998E-01 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 65 Cu                72     ppb

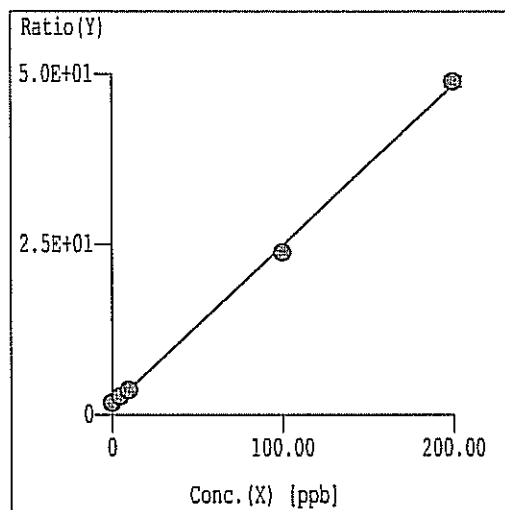


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	6.201E-01	1331	7.533E-01	P	6.591
2		2.000	2.995	2953	1.660E+00	P	5.764
3		5.000	5.671	4945	2.681E+00	P	1.425
4		10.00	11.00	8888	4.715E+00	P	3.823
5		100.0	93.59	6.968E+04	3.624E+01	P	2.242
6		200.0	203.1	1.402E+05	7.806E+01	P	3.294
7		50.00					
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19							
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Curve Fit:       $Y=aX+b$   
 $r = 0.9992$   
 $Y = 3.817E-001 \cdot X + 5.166E-001$   
 $X = 2.620E+000 \cdot Y - 1.353E+000$   
 $DL = 3.902E-01$  ppb  
 $BEC = 1.353$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 66 Zn                72     ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.719	1065	1.716E+00	P	4.986
2	ON	2.000		1395	2.192E+00	P	1.769
3		5.000	5.741	1710	2.663E+00	P	2.979
4		10.00	9.749	2392	3.607E+00	P	4.582
5		100.0	95.59	1.599E+04	2.382E+01	P	6.681E-01
6		200.0	202.2	3.137E+04	4.891E+01	P	1.569
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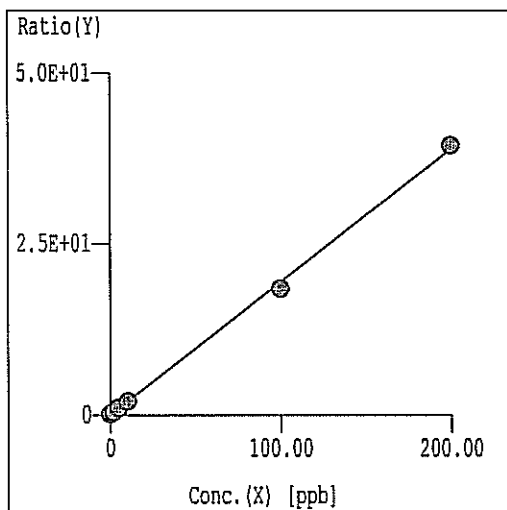
Curve Fit:       $Y=aX+b$   
 $r = 0.9995$   
 $Y = 2.354E-001 \cdot X + 1.311E+000$   
 $X = 4.248E+000 \cdot Y - 5.570E+000$   
 $DL = 1.090$  ppb  
 $BEC = 5.570$  ppb

Weight: OFF  
Min Conc: 0.000



## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 75 As                72    ppb

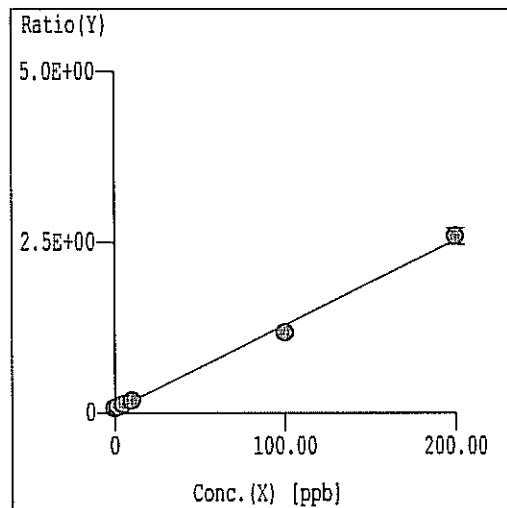


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	75.19	1.212E-01	P	9.323
2		2.000	1.909	312.6	4.909E-01	P	5.916
3		5.000	4.910	689.3	1.072E+00	P	5.118
4		10.00	9.614	1315	1.983E+00	P	4.979
5		100.0	94.56	1.237E+04	1.843E+01	P	8.060E-01
6		200.0	202.7	2.526E+04	3.938E+01	P	7.557E-01
7		50.00					
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Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9995$   
 $Y = 1.936E-001 * X + 1.212E-001$   
 $X = 5.164E+000 * Y - 6.261E-001$   
 $DL = 1.751E-01 \text{ ppb}$   
 $BEC = 6.261E-01 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 82 Se                72    ppb



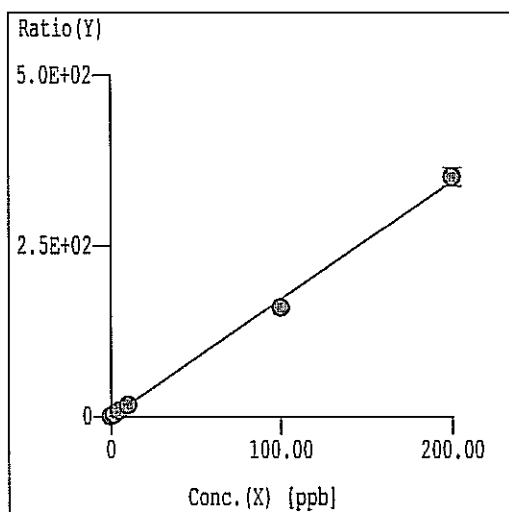
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.539	117.4	6.648E-02	P	8.964
2		2.000	3.378	158.9	8.936E-02	P	10.34
3		5.000	6.141	227.8	1.237E-01	P	9.522
4		10.00	10.58	337.4	1.789E-01	P	2.951
5		100.0	90.87	2265	1.178E+00	P	2.671
6		200.0	204.5	4653	2.591E+00	P	4.567
7		50.00					
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Curve Fit:       $Y = aX + b$   
 $r = 0.9984$   
 $Y = 1.244E-002 * X + 4.734E-002$   
 $X = 8.040E+001 * Y - 3.806E+000$   
 $DL = 1.437 \text{ ppb}$   
 $BEC = 3.806 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 88 Sr                72     ppb

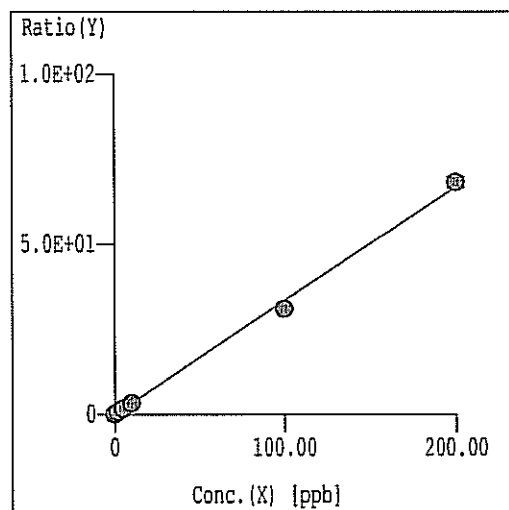


	Ret	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	180.0	1.032E-01	P	56.13
2		2.000	2.019	6379	3.585E+00	P	4.342
3		5.000	5.001	1.609E+04	8.729E+00	P	5.031
4		10.00	9.696	3.172E+04	1.683E+01	P	5.004
5		100.0	92.60	3.073E+05	1.598E+02	P	1.842
6		200.0	203.7	6.313E+05	3.515E+02	P	3.834
7		50.00					
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Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9990$   
 $Y = 1.725E+000 * X + 1.032E-001$   
 $X = 5.798E-001 * Y - 5.983E-002$   
 $DL = 1.007E-01 \text{ ppb}$   
 $BEC = 5.983E-02 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 95 Mo                72     ppb



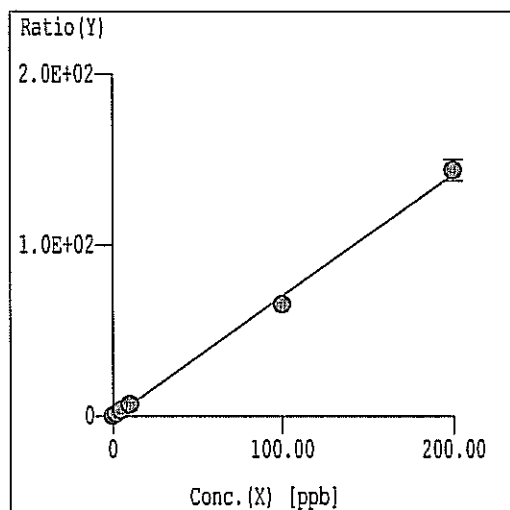
	Ret	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	26.67	1.522E-02	P	35.61
2		2.000	1.967	1199	6.736E-01	P	2.750
3		5.000	4.893	3048	1.653E+00	P	2.258
4		10.00	9.764	6191	3.283E+00	P	2.735
5		100.0	92.34	5.948E+04	3.092E+01	P	7.038E-01
6		200.0	203.8	1.226E+05	6.824E+01	P	2.328
7		50.00					
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Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9990$   
 $Y = 3.347E-001 * X + 1.522E-002$   
 $X = 2.988E+000 * Y - 4.547E-002$   
 $DL = 4.858E-02 \text{ ppb}$   
 $BEC = 4.547E-02 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD      Unit  
(1) 109 Ag                72        ppb

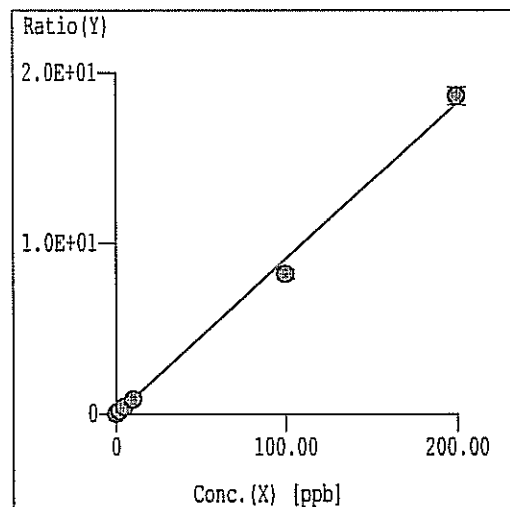


	Rjct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.091	130.0	7.412E-02	P	32.21
2		2.000	3.071	2637	1.482E+00	P	3.752
3		5.000	5.858	6386	3.463E+00	P	2.846
4		10.00	10.60	1.289E+04	6.835E+00	P	9.164E-01
5		100.0	92.88	1.256E+05	6.533E+01	P	1.784
6		200.0	203.5	2.586E+05	1.440E+02	P	4.363
7		50.00					
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Curve Fit:       $Y=aX+b$   
 $r = 0.9990$   
 $Y = 7.109E-001 \cdot X - 7.014E-001$   
 $X = 1.407E+000 \cdot Y + 9.867E-001$   
 $DL = 1.007E-01$  ppb  
 $BEC = -9.867E-01$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD      Unit  
(1) 111 Cd                115        ppb



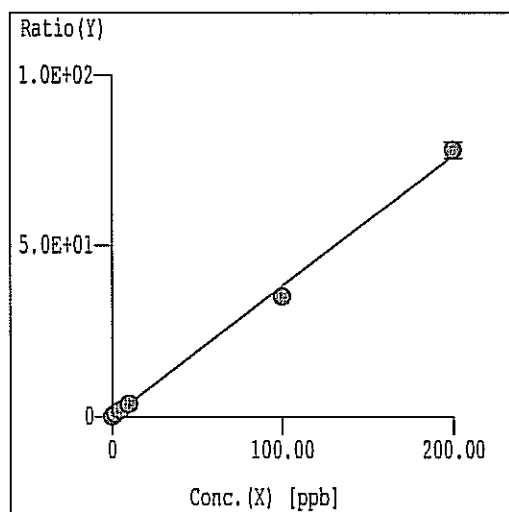
	Rjct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	2.222	7.695E-04	P	52.53
2		2.000	1.934	524.1	1.767E-01	P	11.79
3		5.000	4.719	1318	4.300E-01	P	3.396
4		10.00	9.350	2693	8.513E-01	P	2.732
5		100.0	90.04	2.603E+04	8.191E+00	P	3.316
6		200.0	205.0	5.429E+04	1.865E+01	P	2.800
7		50.00					
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Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9983$   
 $Y = 9.097E-002 \cdot X + 7.695E-004$   
 $X = 1.099E+001 \cdot Y - 8.459E-003$   
 $DL = 1.333E-02$  ppb  
 $BEC = 8.459E-03$  ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 118 Sn                72     ppb

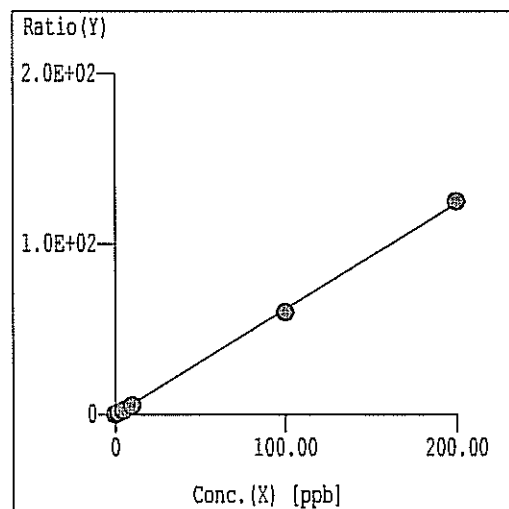


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	52.22	2.963E-02	P	16.06
2		2.000	2.031	1433	8.054E-01	P	3.349
3		5.000	4.800	3435	1.863E+00	P	4.335
4		10.00	9.720	7056	3.743E+00	P	5.537
5		100.0	91.64	6.737E+04	3.504E+01	P	2.134
6		200.0	204.2	1.402E+05	7.804E+01	P	3.097
7		50.00					
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Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9988$   
 $Y = 3.820E-001 * X + 2.963E-002$   
 $X = 2.618E+000 * Y - 7.756E-002$   
DL = 3.738E-02 ppb  
BEC = 7.756E-02 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 121 Sb                72     ppb



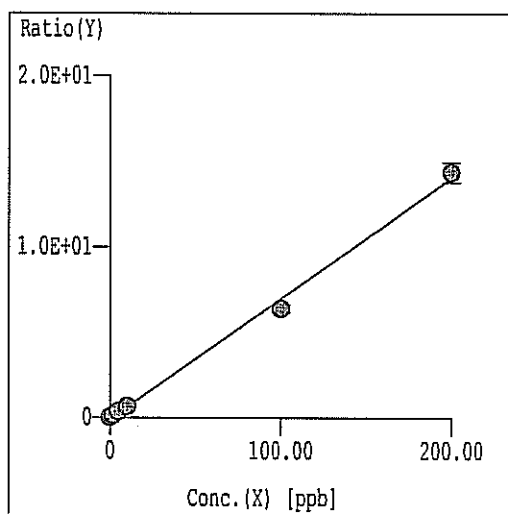
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	15.56	2.521E-02	P	39.03
2		2.000	1.362	552.2	8.677E-01	P	1.738
3		5.000	3.757	1509	2.349E+00	P	2.939
4		10.00	8.356	3447	5.195E+00	P	3.834E-01
5		100.0	96.80	4.022E+04	5.991E+01	P	6.464E-01
6		200.0	201.7	8.008E+04	1.248E+02	P	3.948E-01
7		50.00					
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Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9998$   
 $Y = 6.187E-001 * X + 2.521E-002$   
 $X = 1.616E+000 * Y - 4.075E-002$   
DL = 4.771E-02 ppb  
BEC = 4.075E-02 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 135 Ba            115    ppb

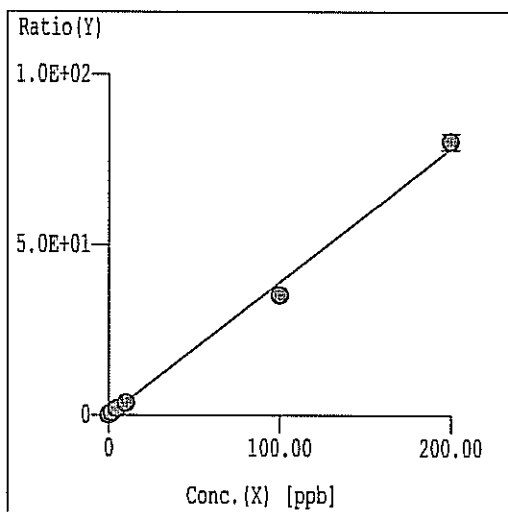


	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.311	22.22	7.729E-03	P	50.38
2		2.000	3.257	432.2	1.455E-01	P	10.66
3		5.000	6.270	1099	3.587E-01	P	6.151
4		10.00	10.52	2082	6.599E-01	P	11.47
5		100.0	91.42	2.029E+04	6.386E+00	P	3.455
6		200.0	204.2	4.183E+04	1.437E+01	P	4.112
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9986$   
 $Y = 7.079E-002 \cdot X - 8.510E-002$   
 $X = 1.413E+001 \cdot Y + 1.202E+000$   
DL = 1.650E-01 ppb  
BEC = -1.202E+00 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 203 Tl            209    ppb



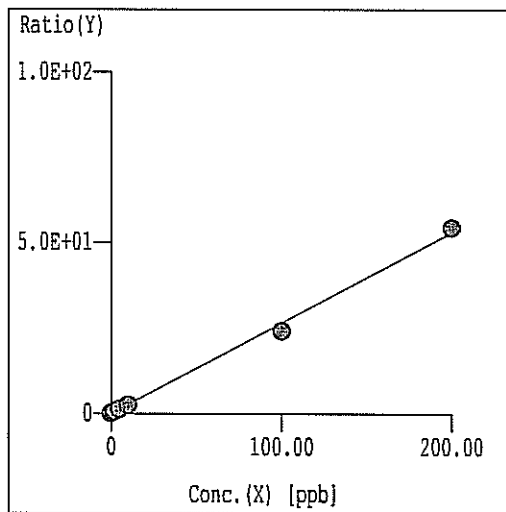
	Rict	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	27.78	1.691E-02	P	3.678
2		2.000	1.913	1248	7.662E-01	P	10.39
3		5.000	4.710	3115	1.861E+00	P	6.259
4		10.00	9.094	6180	3.578E+00	P	1.072
5		100.0	90.00	6.073E+04	3.526E+01	P	1.758
6		200.0	205.1	1.259E+05	8.031E+01	P	2.957
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9983$   
 $Y = 3.916E-001 \cdot X + 1.691E-002$   
 $X = 2.554E+000 \cdot Y - 4.319E-002$   
DL = 4.765E-03 ppb  
BEC = 4.319E-02 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
 (1) 207 Pb            209    ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	73.34	4.483E-02	P	15.05
2		2.000	1.986	932.3	5.713E-01	P	2.612
3		5.000	4.743	2178	1.302E+00	P	7.263
4		10.00	9.146	4262	2.470E+00	P	4.425
5		100.0	90.62	4.144E+04	2.407E+01	P	2.583
6		200.0	204.7	8.514E+04	5.432E+01	P	1.597
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9985$   
 $Y = 2.651E-001 \cdot X + 4.483E-002$   
 $X = 3.772E+000 \cdot Y - 1.691E-001$   
 $DL = 7.632E-02 \text{ ppb}$   
 $BEC = 1.691E-01 \text{ ppb}$

Weight: OFF  
 Min Conc: 0.000

Last Calib: Feb 28, 2008 12:10 pm  
 Calibration Type: External Calibration Method  
 Calibration Title: ICP\_OR.S  
 Weighting Method: 1/(SD\*SD)  
 Mass Interpolation Fit for VIS: Point to Point  
 Method: C:\NCPCHEM\1\METHODS\ICP\_OR.S.M  
 Multi Tune: #1 012807a5.u  
 #2 012807he.u

## === Standard Files ===

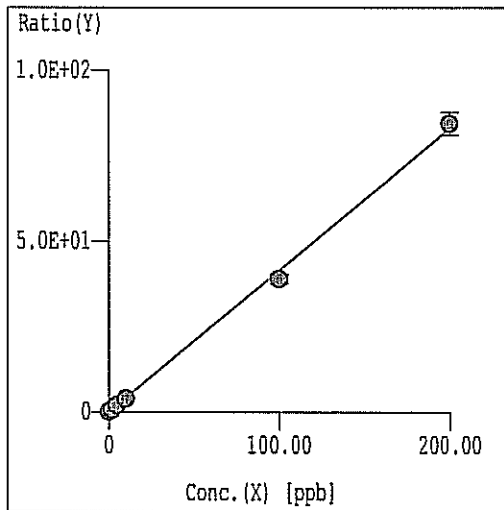
## &lt;Data Correction&gt;

Bkg File: —  
 Rejected Masses: —  
 Interference Correction: ON

	Data File	Sample Name	Date Acquired
1	c:\ncpchem\1\data\08b21\00.b\011calb.d\011calb.d#	CAL BLK	Feb 21 2008 12:26 pm
2	c:\ncpchem\1\data\08b21\00.b\004cals.d\004cals.d#	2/10/200	Feb 21 2008 11:44 am
3	c:\ncpchem\1\data\08b21\00.b\005cals.d\005cals.d#	5/25/500	Feb 21 2008 11:50 am
4	c:\ncpchem\1\data\08b21\00.b\006cals.d\006cals.d#	10/50/1000	Feb 21 2008 11:56 am
5	c:\ncpchem\1\data\08b21\00.b\007cals.d\007cals.d#	100/500/10K	Feb 21 2008 12:02 pm
6	c:\ncpchem\1\data\08b21\00.b\008cals.d\008cals.d#	200/1000/20K	Feb 21 2008 12:08 pm
7	—		
8	—		
9	—		
10	—		
11	—		
12	—		
13	—		
14	—		
15	—		
16	—		
17	—		
18	—		
19	—		
20	—		

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 9 Be                    6       ppb

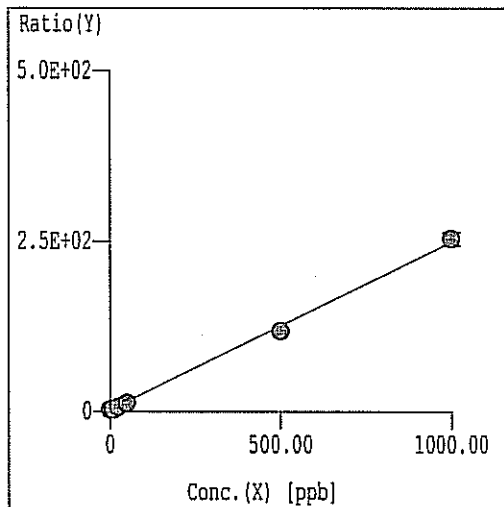


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	32.22	1.659E-02	P	76.47
2		2.000	1.769	1598	7.516E-01	P	6.638
3		5.000	4.870	3994	2.041E+00	P	8.520
4		10.00	9.383	7721	3.916E+00	P	6.825
5		100.0	93.78	7.603E+04	3.899E+01	P	3.568
6		200.0	203.1	1.517E+05	8.444E+01	P	3.982
7		50.00					
8							
9							
10							
11							
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13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9993$   
 $Y = 4.156E-001 \cdot X + 1.659E-002$   
 $X = 2.406E+000 \cdot Y - 3.991E-002$   
DL = 9.157E-02 ppb  
BEC = 3.991E-02 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 11 B                    6       ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	5157	2.640E+00	P	7.828
2		10.00	3.398E-02	5636	2.648E+00	P	7.662E-01
3		25.00	16.49	1.314E+04	6.708E+00	P	3.129
4		50.00	39.86	2.460E+04	1.247E+01	P	3.932
5		500.0	466.6	2.296E+05	1.177E+02	P	2.409
6		1000	1018	4.556E+05	2.536E+02	P	3.819
7		250.0					
8							
9							
10							
11							
12							
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15							
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17							
18							
19							
20							

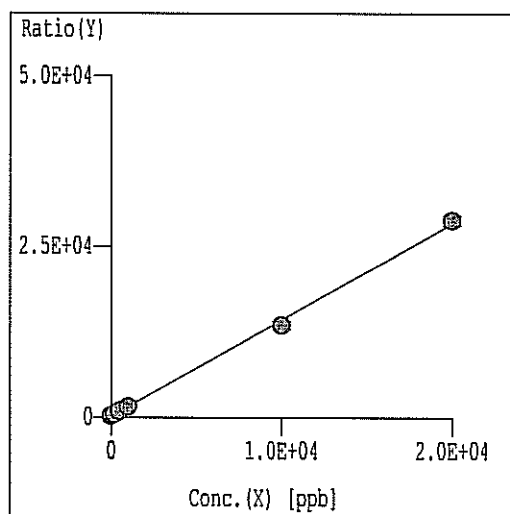
Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9993$   
 $Y = 2.466E-001 \cdot X + 2.640E+000$   
 $X = 4.055E+000 \cdot Y - 1.070E+001$   
DL = 2.514 ppb  
BEC = 10.70 ppb

Weight: OFF  
Min Conc: 0.000



## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 23 Na                72     ppb

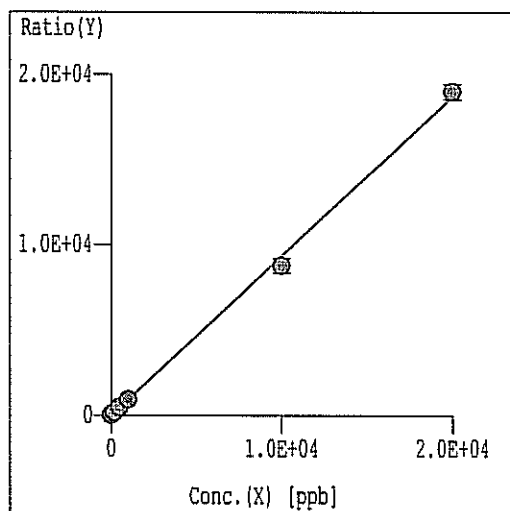


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	4.138E+05	1.952E+02	P	1.487
2		200.0	188.5	1.061E+06	4.610E+02	A	1.905
3		500.0	512.4	1.946E+06	9.178E+02	A	3.000
4		1000	960.8	3.357E+06	1.550E+03	A	4.987
5		1.000E+04	9402	2.902E+07	1.345E+04	A	4.358
6		2.000E+04	2.030E+04	5.730E+07	2.882E+04	A	2.565
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9994$   
 $Y = 1.410E+000 \cdot X + 1.952E+002$   
 $X = 7.091E-001 \cdot Y - 1.384E+002$   
DL = 6.176 ppb  
BEC = 138.4 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 24 Mg                72     ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	1.061E+04	5.003E+00	P	8.233E-01
2		200.0	198.0	4.375E+05	1.901E+02	P	1.630
3		500.0	510.8	1.023E+06	4.825E+02	A	2.858
4		1000	981.8	1.998E+06	9.228E+02	A	5.358
5		1.000E+04	9367	1.889E+07	8.762E+03	A	4.884
6		2.000E+04	2.032E+04	3.777E+07	1.900E+04	A	2.402
7		5000					
8							
9							
10							
11							
12							
13							
14							
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18							
19							
20							

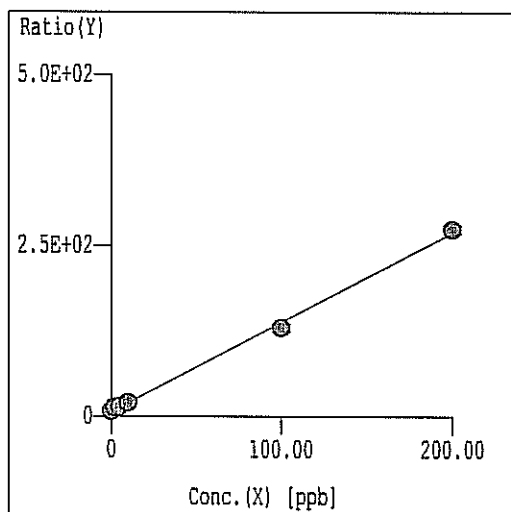
Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9993$   
 $Y = 9.348E-001 \cdot X + 5.003E+000$   
 $X = 1.070E+000 \cdot Y - 5.352E+000$   
DL = 1.322E-01 ppb  
BEC = 5.352 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element  
(1) 27 Al

ISTD 72 Unit  
ppb



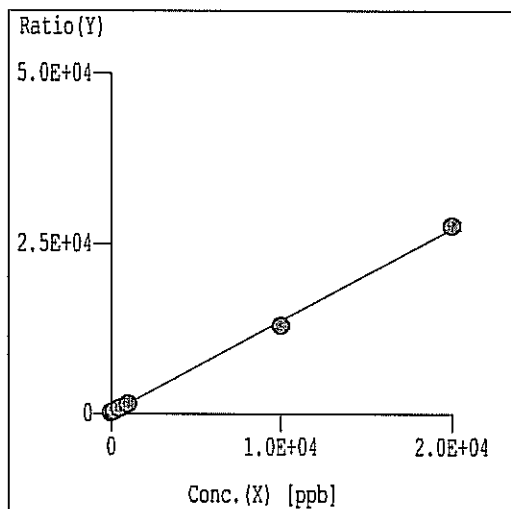
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.818E-01	1.498E+04	7.072E+00	P	7.427
2		2.000	4.775	3.023E+04	1.311E+01	P	27.45
3		5.000	5.376	2.944E+04	1.390E+01	P	6.213
4		10.00	9.933	4.303E+04	1.988E+01	P	7.318
5		100.0	93.54	2.797E+05	1.297E+02	P	4.268
6		200.0	203.2	5.443E+05	2.738E+02	P	2.253
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:  $Y=aX+b$   
 $r = 0.9991$   
 $Y = 1.314E+000 \cdot X + 6.833E+000$   
 $X = 7.612E-001 \cdot Y - 5.202E+000$   
DL = 1.199 ppb  
BEC = 5.202 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element  
(1) 39 K

ISTD 72 Unit  
ppb



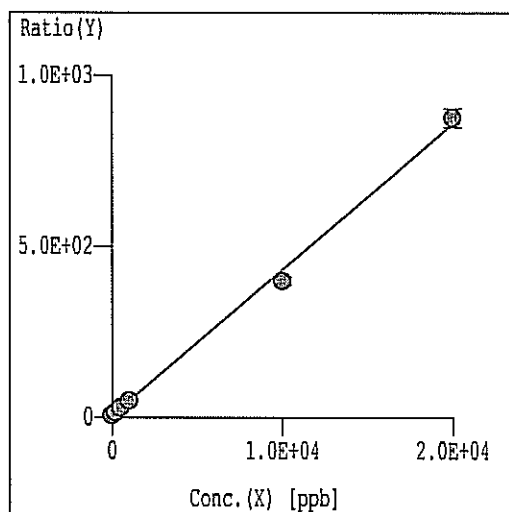
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	3.129E+05	1.476E+02	P	2.419
2		200.0	167.8	8.637E+05	3.753E+02	A	1.738
3		500.0	490.0	1.722E+06	8.125E+02	A	3.671
4		1000	949.9	3.110E+06	1.436E+03	A	5.295
5		1.000E+04	9442	2.795E+07	1.296E+04	A	2.971
6		2.000E+04	2.028E+04	5.500E+07	2.767E+04	A	2.159
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:  $Y=aX+[blank]$   
 $r = 0.9995$   
 $Y = 1.357E+000 \cdot X + 1.476E+002$   
 $X = 7.370E-001 \cdot Y - 1.088E+002$   
DL = 7.894 ppb  
BEC = 108.8 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 44 Ca                72      ppb

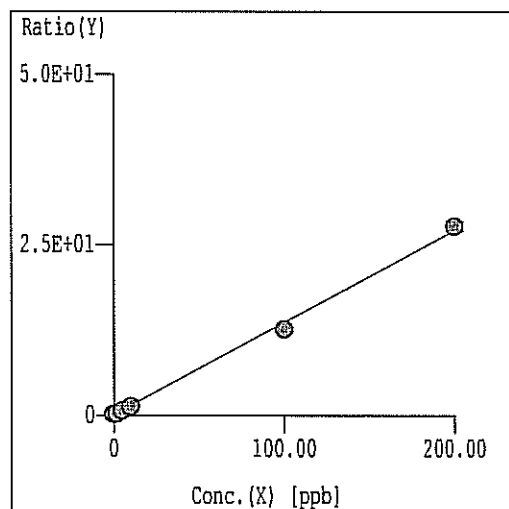


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	1.314E+04	6.199E+00	P	5.491
2		200.0	197.5	3.364E+04	1.462E+01	P	2.415
3		500.0	528.8	6.093E+04	2.875E+01	P	4.101
4		1000	1000	1.058E+05	4.885E+01	P	4.926
5		1.000E+04	9206	8.602E+05	3.988E+02	A	3.037
6		2.000E+04	2.040E+04	1.741E+06	8.760E+02	A	3.105
7		5000					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9989$   
 $Y = 4.264E-002 \cdot X + 6.199E+000$   
 $X = 2.345E+001 \cdot Y - 1.454E+002$   
DL = 23.95 ppb  
BEC = 145.4 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 47 Ti                72      ppb



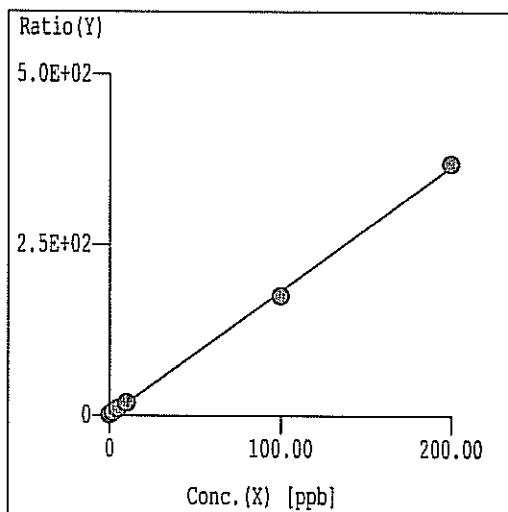
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	309.7	1.490E-01	P	146.1
2		2.000	7.510E-01	575.6	2.504E-01	P	11.85
3		5.000	3.973	1451	6.855E-01	P	9.656
4		10.00	8.505	2813	1.297E+00	P	2.630
5		100.0	92.11	2.715E+04	1.259E+01	P	2.674
6		200.0	204.1	5.507E+04	2.770E+01	P	2.414
7		50.00					
8							
9							
10							
11							
12							
13							
14							
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16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9990$   
 $Y = 1.350E-001 \cdot X + 1.490E-001$   
 $X = 7.406E+000 \cdot Y - 1.103E+000$   
DL = 4.836 ppb  
BEC = 1.103 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 51 V                72    ppb

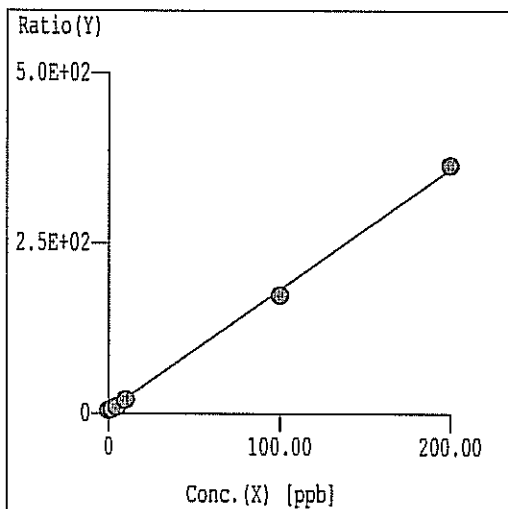


	R	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	5.074E-01	661.1	8.536E-01	P	9.278
2		2.000	2.709	3661	4.875E+00	P	2.066
3		5.000	5.577	7502	1.011E+01	P	1.218
4		10.00	10.25	1.384E+04	1.864E+01	P	5.467E-01
5		100.0	95.99	1.310E+05	1.752E+02	P	2.905E-01
6		200.0	202.0	2.605E+05	3.688E+02	P	6.571E-01
7		50.00					
8							
9							
10							
11							
12							
13							
14							
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17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9997$   
 $Y = 1.826E+000 \cdot X - 7.313E-002$   
 $X = 5.475E-001 \cdot Y + 4.004E-002$   
 $DL = 1.301E-01 \text{ ppb}$   
 $BEC = -4.004E-02 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 52 Cr                72    ppb



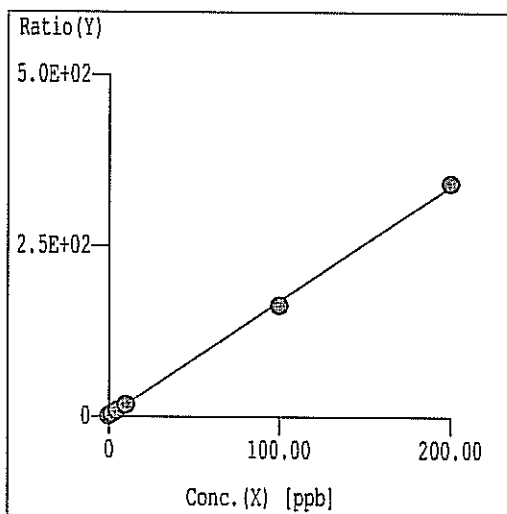
	R	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	3368	4.351E+00	P	4.180E-01
2		2.000	1.063	4682	6.239E+00	P	3.639
3		5.000	2.989	7166	9.661E+00	P	8.191E-01
4		10.00	8.730	1.475E+04	1.986E+01	P	2.000
5		100.0	95.03	1.295E+05	1.732E+02	P	5.574E-01
6		200.0	202.6	2.574E+05	3.643E+02	P	6.405E-01
7		50.00					
8							
9							
10							
11							
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18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9996$   
 $Y = 1.777E+000 \cdot X + 4.351E+000$   
 $X = 5.628E-001 \cdot Y - 2.449E+000$   
 $DL = 3.071E-02 \text{ ppb}$   
 $BEC = 2.449 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 55 Mn                72    ppb

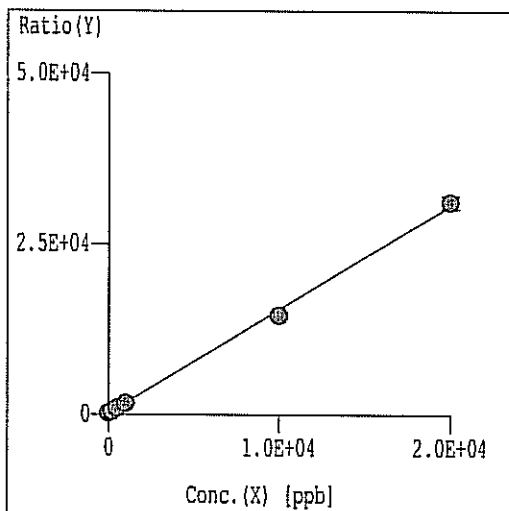


	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	515.6	6.660E-01	P 6.995
2		2.000	1.963	2988	3.979E+00	P 3.535
3		5.000	4.763	8457	8.705E+00	P 1.490
4		10.00	9.728	1.269E+04	1.709E+01	P 2.556
5		100.0	96.02	1.217E+05	1.627E+02	P 7.256E-01
6		200.0	202.0	2.414E+05	3.416E+02	P 3.107E-01
7		50.00				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9997$   
 $Y = 1.688E+000 \cdot X + 6.660E-001$   
 $X = 5.925E-001 \cdot Y - 3.946E-001$   
 $DL = 8.281E-02 \text{ ppb}$   
 $BEC = 3.946E-01 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 56 Fe                72    ppb



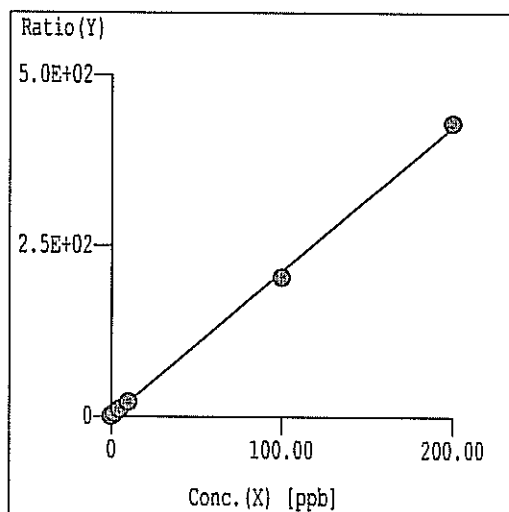
	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	4.367E+05	2.059E+02	P 1.793
2		200.0	161.5	1.040E+06	4.521E+02	A 1.075
3		500.0	483.7	2.000E+06	9.433E+02	A 3.344
4		1000	941.3	3.555E+06	1.641E+03	A 4.059
5		1.000E+04	9391	3.133E+07	1.452E+04	A 3.356
6		2.000E+04	2.031E+04	6.196E+07	3.117E+04	A 3.088
7		5000				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9994$   
 $Y = 1.525E+000 \cdot X + 2.059E+002$   
 $X = 6.559E-001 \cdot Y - 1.351E+002$   
 $DL = 7.267 \text{ ppb}$   
 $BEC = 135.1 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 59 Co                72    ppb

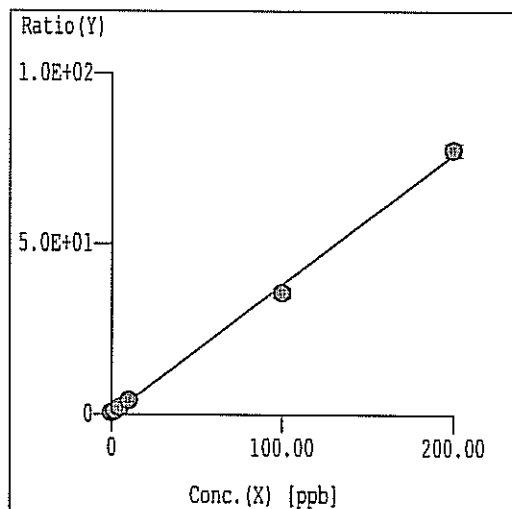


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	102.2	1.321E-01	P	20.99
2		2.000	1.995	3280	4.369E+00	P	2.709
3		5.000	4.896	7813	1.053E+01	P	1.063
4		10.00	9.907	1.573E+04	2.118E+01	P	2.278
5		100.0	95.70	1.521E+05	2.034E+02	P	2.699E-01
6		200.0	202.2	3.035E+05	4.295E+02	P	1.514E-01
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9997$   
 $Y = 2.124E+000 \cdot X + 1.321E-001$   
 $X = 4.708E-001 \cdot Y - 6.219E-002$   
DL = 3.916E-02 ppb  
BEC = 6.219E-02 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 60 Ni                72    ppb



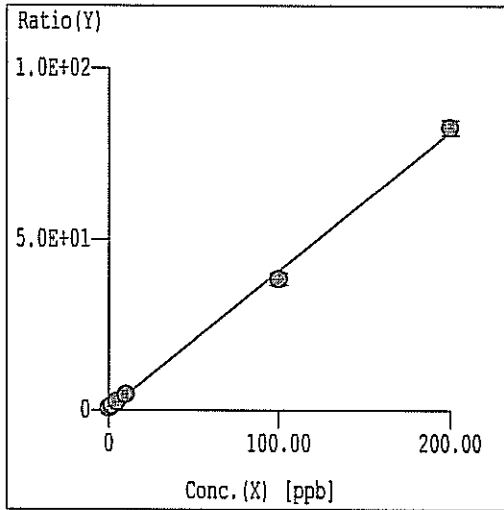
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.349	1018	4.803E-01	P	8.692
2		2.000	2.703	2294	9.972E-01	P	5.718
3		5.000	5.496	4369	2.063E+00	P	9.343
4		10.00	10.78	8837	4.082E+00	P	5.931
5		100.0	93.45	7.687E+04	3.564E+01	P	3.993
6		200.0	203.2	1.541E+05	7.754E+01	P	2.468
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9992$   
 $Y = 3.817E-001 \cdot X - 3.477E-002$   
 $X = 2.620E+000 \cdot Y + 9.109E-002$   
DL = 3.281E-01 ppb  
BEC = -9.109E-02 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 65 Cu                72     ppb

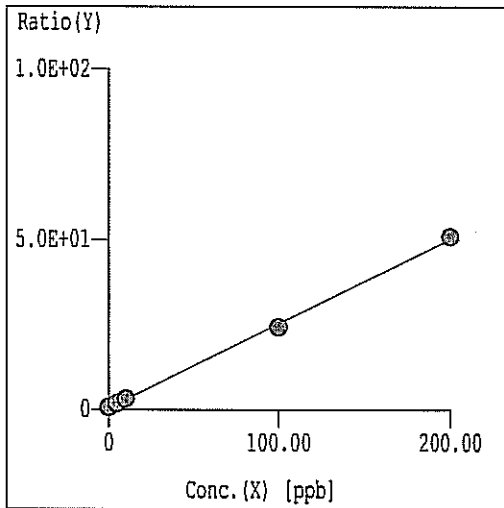


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	8.040E-01	1157	5.452E-01	P	2.477
2		2.000	2.752	3076	1.337E+00	P	2.769
3		5.000	5.683	5357	2.528E+00	P	5.533
4		10.00	10.78	9957	4.600E+00	P	6.972
5		100.0	94.08	8.292E+04	3.845E+01	P	4.676
6		200.0	202.9	1.643E+05	8.267E+01	P	2.651
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9993$   
 $Y = 4.064E-001 * X + 2.185E-001$   
 $X = 2.461E+000 * Y - 5.377E-001$   
DL = 9.969E-02 ppb  
BEC = 5.377E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 66 Zn                72     ppb



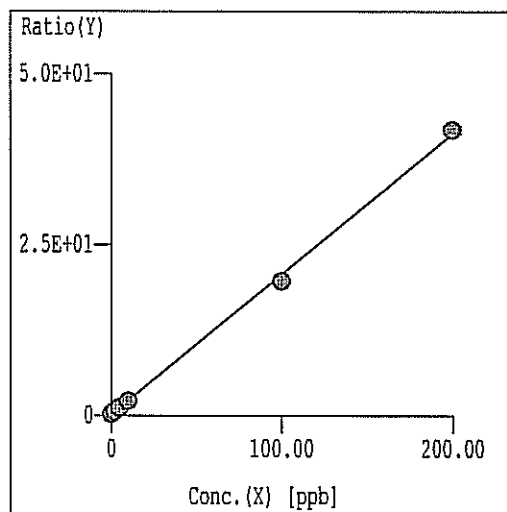
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	7.952E-01	476.7	6.158E-01	P	1.467
2	ON	2.000		876.7	1.167E+00	P	6.560
3		5.000	5.589	1345	1.813E+00	P	3.820
4		10.00	10.99	2349	3.163E+00	P	2.615
5		100.0	95.38	1.812E+04	2.424E+01	P	1.032
6		200.0	202.2	3.598E+04	5.094E+01	P	1.709
7							
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9995$   
 $Y = 2.498E-001 * X + 4.172E-001$   
 $X = 4.003E+000 * Y - 1.670E+000$   
DL = 1.085E-01 ppb  
BEC = 1.670 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 75 As                72      ppb

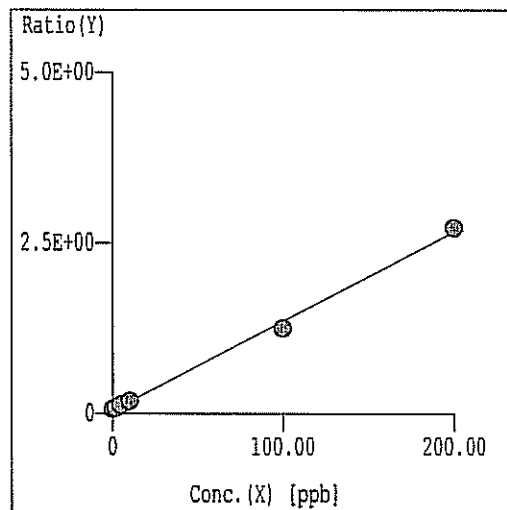


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	130.0	1.677E-01	P	18.52
2		2.000	1.990	433.0	5.765E-01	P	7.031
3		5.000	4.862	865.2	1.166E+00	P	1.094
4		10.00	9.499	1574	2.119E+00	P	3.147
5		100.0	94.88	1.470E+04	1.966E+01	P	1.365
6		200.0	202.6	2.952E+04	4.178E+01	P	1.322
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9995$   
 $Y = 2.054E-001 \cdot X + 1.677E-001$   
 $X = 4.868E+000 \cdot Y - 8.163E-001$   
DL = 4.534E-01 ppb  
BEC = 8.163E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 82 Se                72      ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	1.519	134.1	6.321E-02	P	5.202E-01
2		2.000	2.771	183.3	7.963E-02	P	4.854
3		5.000	6.438	270.7	1.277E-01	P	1.943
4		10.00	10.49	391.5	1.808E-01	P	5.366
5		100.0	91.69	2686	1.245E+00	P	1.283
6		200.0	204.1	5402	2.717E+00	P	1.440
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
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18							
19							
20							

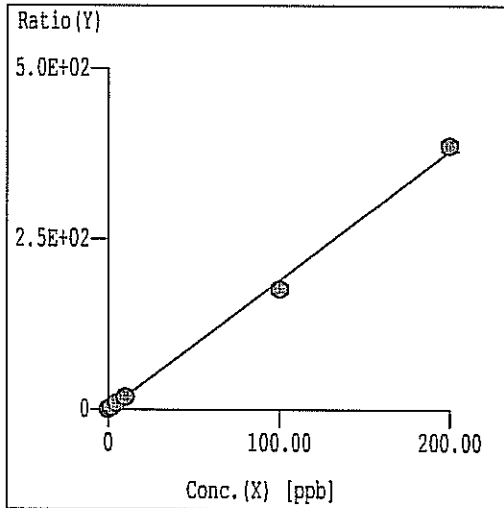
Curve Fit:       $Y=aX+b$   
 $r = 0.9986$   
 $Y = 1.310E-002 \cdot X + 4.332E-002$   
 $X = 7.632E+001 \cdot Y - 3.306E+000$   
DL = 7.530E-02 ppb  
BEC = 3.306 ppb

Weight: OFF  
Min Conc: 0.000



## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 88 Sr                72     ppb

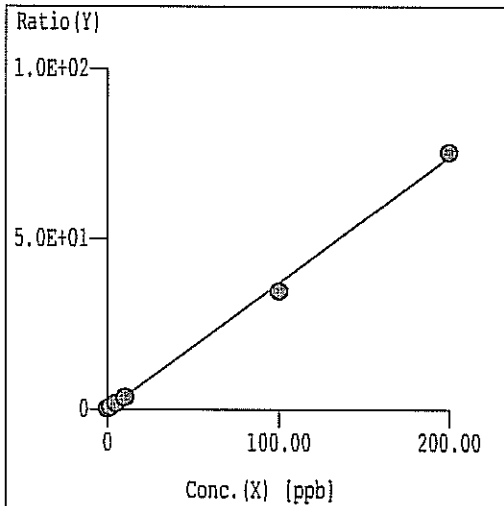


	Rt	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	351.1	1.656E-01	P	3.478
2		2.000	1.752	8031	3.491E+00	P	2.864
3		5.000	4.836	1.981E+04	9.345E+00	P	2.879
4		10.00	9.497	3.940E+04	1.819E+01	P	4.579
5		100.0	92.67	3.797E+05	1.761E+02	P	3.617
6		200.0	203.7	7.689E+05	3.868E+02	P	2.057
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9991$   
 $Y = 1.898E+000 \cdot X + 1.656E-001$   
 $X = 5.269E-001 \cdot Y - 8.724E-002$   
DL = 9.103E-03 ppb  
BEC = 8.724E-02 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 95 Mo                72     ppb



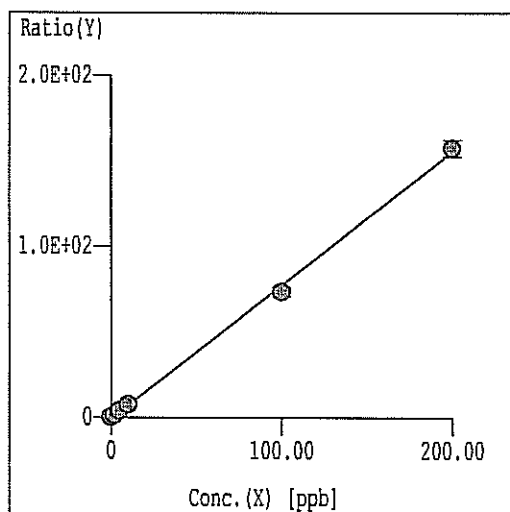
	Rt	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	245.6	1.159E-01	P	10.59
2		2.000	1.523	1565	6.800E-01	P	2.793
3		5.000	4.500	3778	1.783E+00	P	5.037
4		10.00	9.133	7582	3.500E+00	P	3.091
5		100.0	93.23	7.476E+04	3.466E+01	P	2.631
6		200.0	203.4	1.501E+05	7.549E+01	P	9.365E-01
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9992$   
 $Y = 3.705E-001 \cdot X + 1.159E-001$   
 $X = 2.699E+000 \cdot Y - 3.127E-001$   
DL = 9.938E-02 ppb  
BEC = 3.127E-01 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 109 Ag                72     ppb

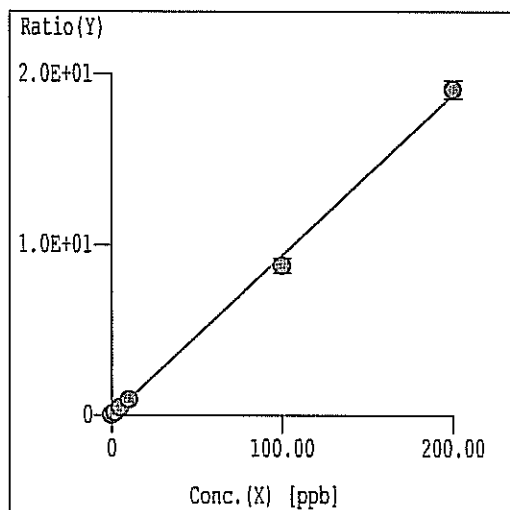


	Rt	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	8.452E-01	236.7	1.115E-01	P	13.08
2		2.000	2.600	3405	1.479E+00	P	1.497
3		5.000	5.837	8483	4.002E+00	P	4.890
4		10.00	10.35	1.629E+04	7.523E+00	P	5.206
5		100.0	94.82	1.582E+05	7.336E+01	P	3.687
6		200.0	202.5	3.127E+05	1.573E+02	P	3.085
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+b$   
 $r = 0.9995$   
 $Y = 7.794E-001 \cdot X - 5.473E-001$   
 $X = 1.283E+000 \cdot Y + 7.022E-001$   
DL = 5.613E-02 ppb  
BEC = -7.022E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 111 Cd                115    ppb



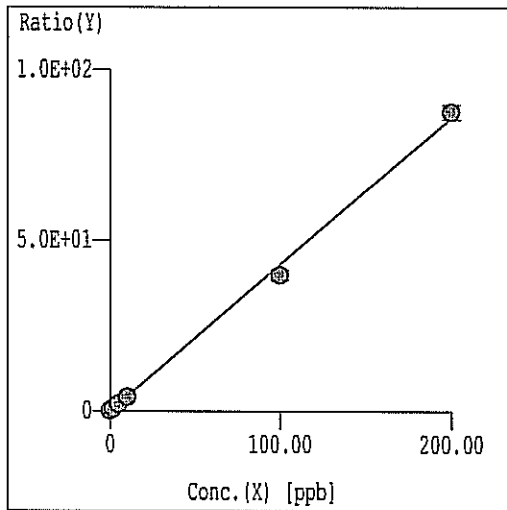
	Rt	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	15.93	4.319E-03	P	20.17
2		2.000	1.689	654.8	1.630E-01	P	7.442
3		5.000	4.760	1670	4.514E-01	P	3.352
4		10.00	9.702	3429	9.157E-01	P	3.836
5		100.0	93.40	3.301E+04	8.778E+00	P	4.921
6		200.0	203.3	6.613E+04	1.910E+01	P	2.818
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9993$   
 $Y = 9.393E-002 \cdot X + 4.319E-003$   
 $X = 1.065E+001 \cdot Y - 4.598E-002$   
DL = 2.782E-02 ppb  
BEC = 4.598E-02 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 118 Sn                72     ppb

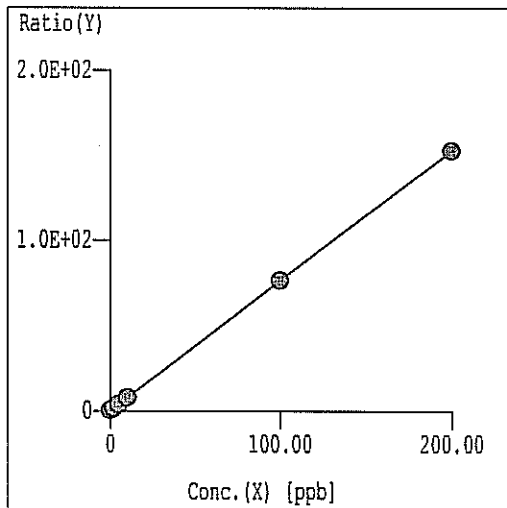


	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	173.3	8.183E-02	P	20.18
2		2.000	1.647	1817	7.893E-01	P	6.089
3		5.000	4.711	4464	2.106E+00	P	4.529
4		10.00	9.301	8833	4.079E+00	P	4.657
5		100.0	92.40	8.581E+04	3.979E+01	P	3.836
6		200.0	203.8	1.743E+05	8.768E+01	P	2.489
7		50.00					
8							
9							
10							
11							
12							
13							
14							
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16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9990$   
 $Y = 4.297E-001 \cdot X + 8.183E-002$   
 $X = 2.327E+000 \cdot Y - 1.904E-001$   
 $DL = 1.153E-01$  ppb  
 $BEC = 1.904E-01$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 121 Sb                72     ppb



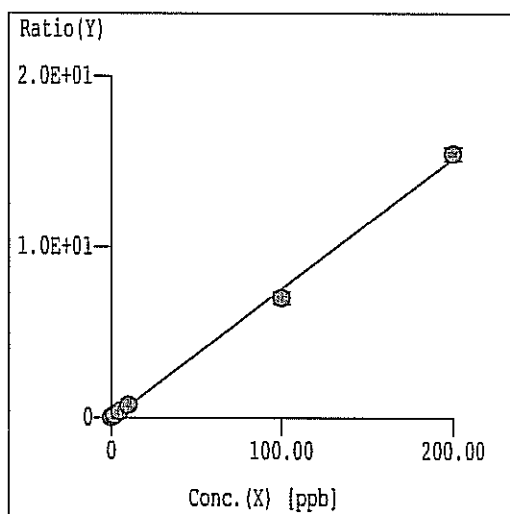
	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	277.8	3.590E-01	P	4.507
2		2.000	1.582	1175	1.564E+00	P	5.039
3		5.000	4.657	2897	3.906E+00	P	1.080
4		10.00	9.845	5834	7.857E+00	P	1.258
5		100.0	99.96	5.718E+04	7.648E+01	P	7.296E-01
6		200.0	200.0	1.079E+05	1.527E+02	P	3.585E-01
7		50.00					
8							
9							
10							
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14							
15							
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17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 1.0000$   
 $Y = 7.616E-001 \cdot X + 3.590E-001$   
 $X = 1.313E+000 \cdot Y - 4.714E-001$   
 $DL = 6.374E-02$  ppb  
 $BEC = 4.714E-01$  ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 135 Ba                115    ppb

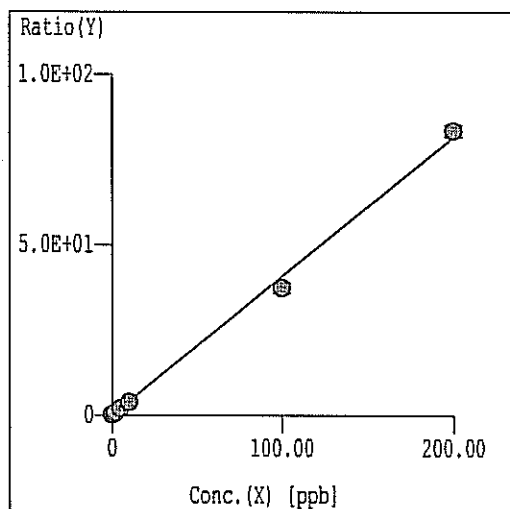


	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	1.134	30.00	8.172E-03	P 40.56
2		2.000	2.958	592.3	1.473E-01	P 6.049
3		5.000	5.880	1370	3.702E-01	P 2.746
4		10.00	10.67	2753	7.353E-01	P 5.740
5		100.0	92.85	2.634E+04	7.006E+00	P 5.197
6		200.0	203.5	5.348E+04	1.545E+01	P 2.585
7		50.00				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:       $Y = aX + b$   
 $r = 0.9990$   
 $Y = 7.629E-002 * X - 7.838E-002$   
 $X = 1.311E+001 * Y + 1.027E+000$   
DL = 1.303E-01 ppb  
BEC = -1.027E+00 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 203 Tl                209    ppb



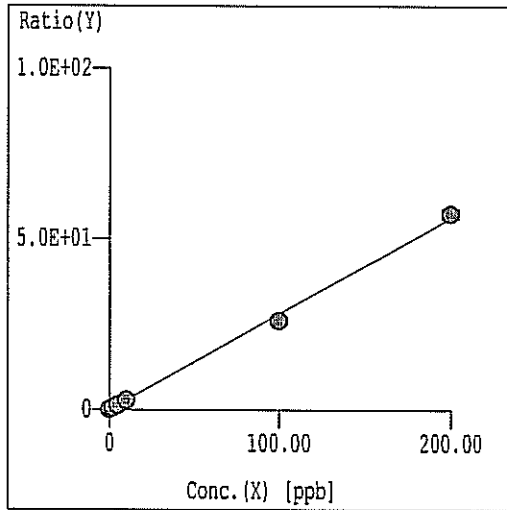
	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	0.000	227.8	1.110E-01	P 8.213
2		2.000	1.484	1650	7.161E-01	P 8.096
3		5.000	4.574	4141	1.976E+00	P 2.248
4		10.00	9.076	8083	3.812E+00	P 1.790
5		100.0	91.36	7.837E+04	3.736E+01	P 4.004
6		200.0	204.4	1.577E+05	8.345E+01	P 2.126
7		50.00				
8						
9						
10						
11						
12						
13						
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15						
16						
17						
18						
19						
20						

Curve Fit:       $Y = aX + [\text{blank}]$   
 $r = 0.9987$   
 $Y = 4.077E-001 * X + 1.110E-001$   
 $X = 2.452E+000 * Y - 2.723E-001$   
DL = 6.709E-02 ppb  
BEC = 2.723E-01 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
 (1) 207 Pb                209    ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio		RSD [%]
1		0.000	0.000	111.1	5.406E-02	P	4.639
2		2.000	1.674	1207	5.241E-01	P	2.564
3		5.000	4.672	2860	1.366E+00	P	4.203
4		10.00	9.615	5834	2.754E+00	P	5.266
5		100.0	92.44	5.456E+04	2.601E+01	P	3.918
6		200.0	203.8	1.082E+05	5.728E+01	P	2.422
7		50.00					
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

Curve Fit:       $Y=aX+[blank]$   
 $r = 0.9990$   
 $Y = 2.808E-001 \cdot X + 5.406E-002$   
 $X = 3.561E+000 \cdot Y - 1.925E-001$   
 DL = 2.680E-02 ppb  
 BEC = 1.925E-01 ppb

Weight: OFF  
 Min Conc: 0.000

Last Calib: Feb 28, 2008 03:56 pm  
 Calibration Type: External Calibration Method  
 Calibration Title: ICP\_OR5  
 Weighting Method: 1/(SD\*SD)  
 Mass Interpolation Fit for VIS: Point to Point  
 Method: C:\ICPCHEM\1\METHODS\ICP\_LI.M  
 Multi Tune: #1 022708a1.u  
 #2 051107he.u

=== Standard Files ===

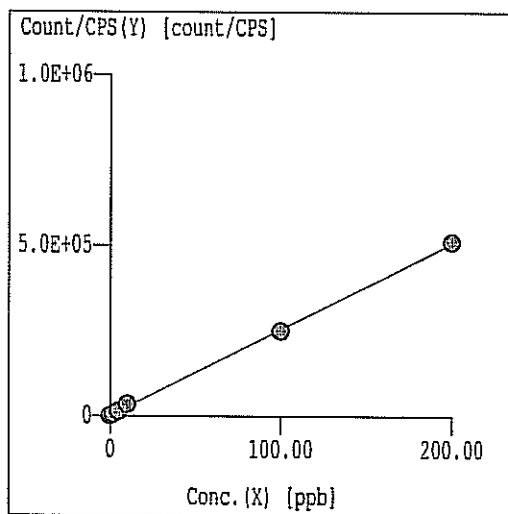
<Data Correction>

Bkg File: ---  
 Rejected Masses: ---  
 Interference Correction: OFF

	Data File	Sample Name	Date Acquired
1	c:\icpchem\1\data\08b27m00.b\002calb.d	CAL BLK	Feb 27 2008 12:09 pm
2	c:\icpchem\1\data\08b27m00.b\003cals.d	2/10/200	Feb 27 2008 12:12 pm
3	c:\icpchem\1\data\08b27m00.b\004cals.d	5/25/500	Feb 27 2008 12:16 pm
4	c:\icpchem\1\data\08b27m00.b\005cals.d	10/50/1000	Feb 27 2008 12:19 pm
5	c:\icpchem\1\data\08b27m00.b\006cals.d	100/500/10K	Feb 27 2008 12:22 pm
6	c:\icpchem\1\data\08b27m00.b\007cals.d	200/1000/20K	Feb 27 2008 12:26 pm
7	---		
8	---		
9	---		
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11	---		
12	---		
13	---		
14	---		
15	---		
16	---		
17	---		
18	---		
19	---		
20	---		

## === Graph Detail ===

Step Mass Element      ISTD      Unit  
 (1) 7 Li                      —      ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-6.876E-01	117.8		P 7.122
2		2.000	1.407	5415		P 2.586
3		5.000	4.661	1.364E+04		P 1.798
4		10.00	12.84	3.434E+04		P 2.868E-01
5		100.0	97.81	2.492E+05		P 1.395
6		200.0	201.0	5.101E+05		P 5.519E-01
7						
8						
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Curve Fit:  $Y=aX+b$   
 $r = 0.9998$   
 $Y = 2.529E+003 \cdot X + 1.857E+003$   
 $X = 3.954E-004 \cdot Y - 7.342E-001$   
 $DL = 9.951E-03 \text{ ppb}$   
 $BEC = 7.342E-01 \text{ ppb}$

Weight: OFF  
 Min Conc: 0.000

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: MERCURY 080225A

Continuing Calibration Source:

Start: 2/25/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Mercury	5.0	4.94	98.8	5.0	4.83	96.6	4.88	97.6	AV

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN



2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802304

Initial Calibration Source:

Run: MERCURY 080225A

Continuing Calibration Source:

Start: 2/25/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Mercury	5.0	4.94	98.8	5.0	4.87	97.4			AV

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc. Contract: \_\_\_\_\_

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.: \_\_\_\_\_ SDG No.: 0802304

Preparation Blank Matrix (soil/water): SOIL Run: MERCURY 080225A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L) C		Continuing Calibration Blank (ug/L)						Prepa- ration Blank C		M
			1	C	2	C	3	C			
Mercury	0.0		-0.1		-0.1		-0.1		0.000		AV

Note: MDLs are used, not IDLs

FORM III - IN

# CETAC Hg Analysis Report

Analyst: instrument

Worksheet file: C:\Program Files\QuickTrace\Worksheets\022508AS.wsz

Date Started: 2/25/2008 12:52:07 PM

Comment:

ICAL STD# 731-584-60.11  
MS/LCS STD# 731-584-60.12  
JC. 2/25/08

## Results

Sample Name					Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
Calibration Blank					STD	02/25/08 02:37:19 pm	0.000	61	7.70
Replicates	66.2	62.5	57.4	56.1					
Standard #1					STD	02/25/08 02:39:18 pm	0.200	819	1.10
Replicates	805.8	820.1	823.0	826.2					
Standard #2					STD	02/25/08 02:41:18 pm	1.000	3799	0.69
Replicates	3774.5	3782.8	3805.1	3832.9					
Standard #3					STD	02/25/08 02:43:18 pm	2.000	7621	0.99
Replicates	7537.2	7584.9	7654.9	7708.9					
Standard #4					STD	02/25/08 02:45:20 pm	5.000	18731	0.42
Replicates	18635.1	18707.5	18762.4	18818.2					
Standard #5					STD	02/25/08 02:47:24 pm	10.000	36046	0.66
Replicates	35809.0	35910.0	36119.6	36345.4					

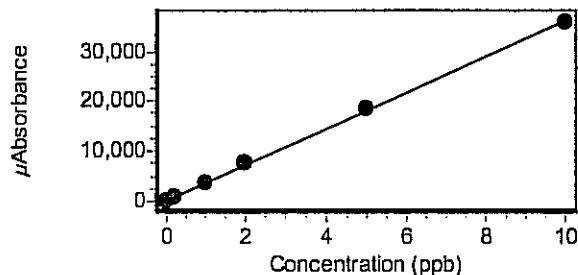
### Calibration

Equation:  $A = 240.998 + 3606.070C$

R2: 0.99963

SEE: 300.1214

Flags:



ICV-584-60-13					ICV	02/25/08 02:52:23 pm	4.940	18040	0.32
Replicates	17956.2	18048.9	18064.2	18090.4					
% Recovery	98.72								
ICB					ICB	02/25/08 02:54:25 pm	-0.048	69	23.75
Replicates	87.3	73.7	65.2	48.4					

Sample Name					Type	Date/Time	Conc (ppb)	μAbs	%RSD
CRA-584-60-11					CRDL	02/25/08 02:56:26 pm	0.158	810	0.77
Replicates	801.6	810.8	816.6	811.5					
% Recovery	78.91								
GBLKS1-022508					MB	02/25/08 02:58:24 pm	-0.041	92	4.42
Replicates	96.8	90.8	92.0	87.0					
GLCSS1-022508-584-60-12					LCS	02/25/08 03:00:26 pm	5.210	19047	0.55
Replicates	18914.4	19015.4	19099.5	19156.9					
% Recovery	104.30								
GLCSDS1-022508-584-60-12					LCS	02/25/08 03:02:28 pm	5.170	18879	0.56
Replicates	18737.8	18857.1	18951.0	18968.4					
% Recovery	103.37								
0802300-01C					UNK	02/25/08 03:12:09 pm	0.142	752	0.40
Replicates	748.3	753.5	752.2	755.5					
0802300-01CDUP					DUP	02/25/08 03:14:09 pm	0.143	756	0.80
Replicates	748.1	761.4	760.5	755.7					
		RPD 0.00							
0802300-01CMS-584-60-12					MSK	02/25/08 03:16:10 pm	4.990	18223	0.62
Replicates	18072.7	18201.7	18308.4	18309.3					
% Recovery	96.87								
0802300-01CMSD-584-60-12					MSDUP	02/25/08 03:18:14 pm	5.060	18479	0.25
Replicates	18410.6	18487.0	18506.7	18511.2					
% Recovery	98.29	RPD 1.41							
CCV-584-60-13					CCV	02/25/08 03:20:16 pm	4.830	17656	1.05
Replicates	17451.8	17562.3	17744.5	17866.4					
% Recovery	96.59								
CCB					CCB	02/25/08 03:22:19 pm	-0.058	32	16.32
Replicates	39.6	31.5	29.9	27.5					
0802300-02D					UNK	02/25/08 03:29:21 pm	-0.022	161	1.78
Replicates	159.2	157.5	163.9	162.1					
0802300-03C					UNK	02/25/08 03:31:21 pm	-0.035	115	2.04
Replicates	112.1	116.4	116.1	117.4					

Sample Name					Type	Date/Time	Conc (ppb)	μAbs	%RSD
0802300-04C					UNK	02/25/08 03:33:20 pm	0.080	529	0.45
Replicates	528.2	526.1	529.8	531.7					
0802300-05D					UNK	02/25/08 03:35:20 pm	-0.039	99	2.25
Replicates	97.6	97.9	98.3	102.3					
0802300-06C					UNK	02/25/08 03:37:21 pm	-0.034	118	3.59
Replicates	111.9	121.6	117.9	120.1					
0802300-07D					UNK	02/25/08 03:39:21 pm	-0.025	150	2.97
Replicates	143.9	151.7	154.3	151.6					
0802300-08D					UNK	02/25/08 03:41:23 pm	-0.025	150	3.00
Replicates	144.9	147.9	152.4	155.0					
0802304-01D					UNK	02/25/08 03:43:24 pm	-0.015	188	3.14
Replicates	183.7	191.1	195.1	182.8					
0802304-02D					UNK	02/25/08 03:45:26 pm	0.003	253	1.51
Replicates	247.5	253.8	256.7	252.6					
0802304-03D					UNK	02/25/08 03:47:29 pm	0.014	291	2.49
Replicates	280.1	295.5	292.3	295.1					
CCV-584-60-13					CCV	02/25/08 03:49:31 pm	4.880	17850	0.76
Replicates	17656.9	17852.2	17935.0	17956.0					
% Recovery	97.66								
CCB					CCB	02/25/08 03:53:52 pm	-0.058	33	18.54
Replicates	38.6	27.7	27.3	37.3					
0802318-01C					UNK	02/25/08 03:55:51 pm	0.151	785	0.46
Replicates	781.0	782.9	786.5	789.2					
0802318-02D					UNK	02/25/08 03:57:50 pm	-0.032	124	3.00
Replicates	129.5	123.0	121.5	122.0					

Sample Name					Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
0802318-03C					UNK	02/25/08 03:59:51 pm	-0.002	232	1.29
Replicates	234.2	234.8	231.5	228.2					
0802318-04C					UNK	02/25/08 04:01:50 pm	-0.015	188	2.01
Replicates	189.0	191.5	183.0	190.4					
CCV-584-60-13					CCV	02/25/08 04:03:52 pm	4.870	17809	0.60
Replicates	17702.2	17753.5	17833.8	17948.2					
% Recovery	97.44								
CCB					CCB	02/25/08 04:05:56 pm	-0.060	23	26.59
Replicates	31.5	20.0	17.7	21.9					
GBLKS2-022508					MB	02/25/08 04:13:57 pm	-0.052	55	10.57
Replicates	48.3	52.7	54.8	62.1					
GLCSS2-022508-584-60-12					LCS	02/25/08 04:15:58 pm	5.120	18707	0.58
Replicates	18550.5	18719.3	18791.5	18768.6					
% Recovery	102.42								
GLCSDS2-022508-584-60-12					LCS	02/25/08 04:18:04 pm	5.240	19127	0.25
Replicates	19063.9	19124.4	19144.6	19176.9					
% Recovery	104.75								
0802326-06C					UNK	02/25/08 04:20:07 pm	-0.047	73	7.40
Replicates	77.3	74.0	75.7	65.2					
0802326-06CDUP					DUP	02/25/08 04:22:11 pm	-0.049	66	5.61
Replicates	67.9	64.9	69.1	60.8					
	RPD 0.00								
0802326-06CMS-584-60-12					MSK	02/25/08 04:24:13 pm	4.690	17147	0.17
Replicates	17104.8	17163.7	17165.8	17154.7					
% Recovery	94.74								
0802326-06CMSD-584-60-12					MSDUP	02/25/08 04:26:15 pm	4.800	17548	0.48
Replicates	17440.4	17529.4	17587.3	17636.7					
% Recovery	96.96	RPD 2.35							
0802326-01B					UNK	02/25/08 04:28:17 pm	0.118	667	0.45
Replicates	667.8	663.1	669.6	669.3					

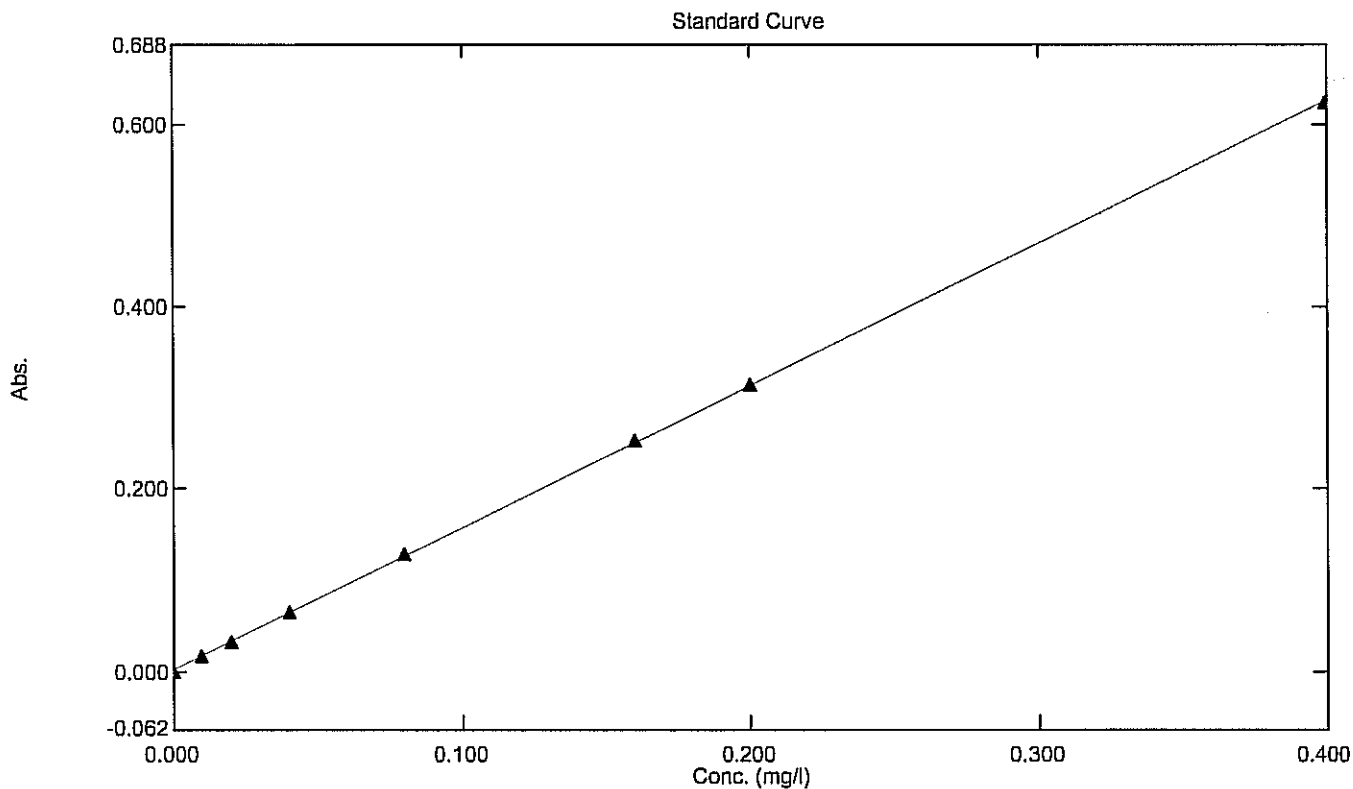
Sample Name				Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
0802326-02B				UNK	02/25/08 04:30:19 pm	-0.015	187	2.57
Replicates	183.3	185.8	184.5	193.9				
0802326-03C				UNK	02/25/08 04:32:19 pm	-0.034	119	0.96
Replicates	117.7	118.7	119.7	120.2				
CCV-584-60-13				CCV	02/25/08 04:34:20 pm	4.910	17960	0.73
Replicates	17807.5	17901.0	18030.0	18101.9				
% Recovery	98.27							
CCB				CCB	02/25/08 04:36:25 pm	-0.056	39	12.33
Replicates	43.6	35.4	34.3	42.7				
0802326-04C				UNK	02/25/08 04:38:27 pm	0.011	281	2.11
Replicates	282.9	288.1	275.8	276.1				
0802326-05C				UNK	02/25/08 04:40:30 pm	0.054	436	0.88
Replicates	434.1	436.1	432.7	441.4				
0802326-07C				UNK	02/25/08 04:42:32 pm	0.033	360	0.81
Replicates	360.8	362.9	358.3	356.2				
0802326-08B				UNK	02/25/08 04:44:34 pm	0.030	348	0.67
Replicates	346.2	351.4	346.7	348.4				
0802326-09B				UNK	02/25/08 04:46:37 pm	-0.035	117	1.96
Replicates	118.4	115.3	118.5	113.9				
0802326-10C				UNK	02/25/08 04:48:41 pm	-0.036	110	3.47
Replicates	112.3	112.4	110.3	104.3				
CCV-584-60-13				CCV	02/25/08 04:50:42 pm	4.960	18111	0.23
Replicates	18050.6	18134.2	18139.1	18118.3				
% Recovery	99.11							
CCB				CCB	02/25/08 04:52:46 pm	-0.065	6	43.53
Replicates	5.1	8.1	7.0	2.5				

# Standard Table Report

02/28/2008 04:03:16 PM

File Name: C:\Program

Files\Shimadzu\UVProbe\Data\CALIBRATION\Cyanide\120707\_CN\_TW\_TS\_CAL.p



Standard Table

	Sample ID	Type	Ex	Conc	WL578.0	Wgt.Factor	Comments
1	STD1	Standard		0.000	0.000	1.000	
2	STD2	Standard		0.010	0.016	1.000	
3	STD3	Standard		0.020	0.032	1.000	
4	STD4	Standard		0.040	0.065	1.000	
5	STD5	Standard		0.080	0.128	1.000	
6	STD6	Standard		0.160	0.253	1.000	
7	STD7	Standard		0.200	0.316	1.000	
8	STD8	Standard		0.400	0.625	1.000	
9							



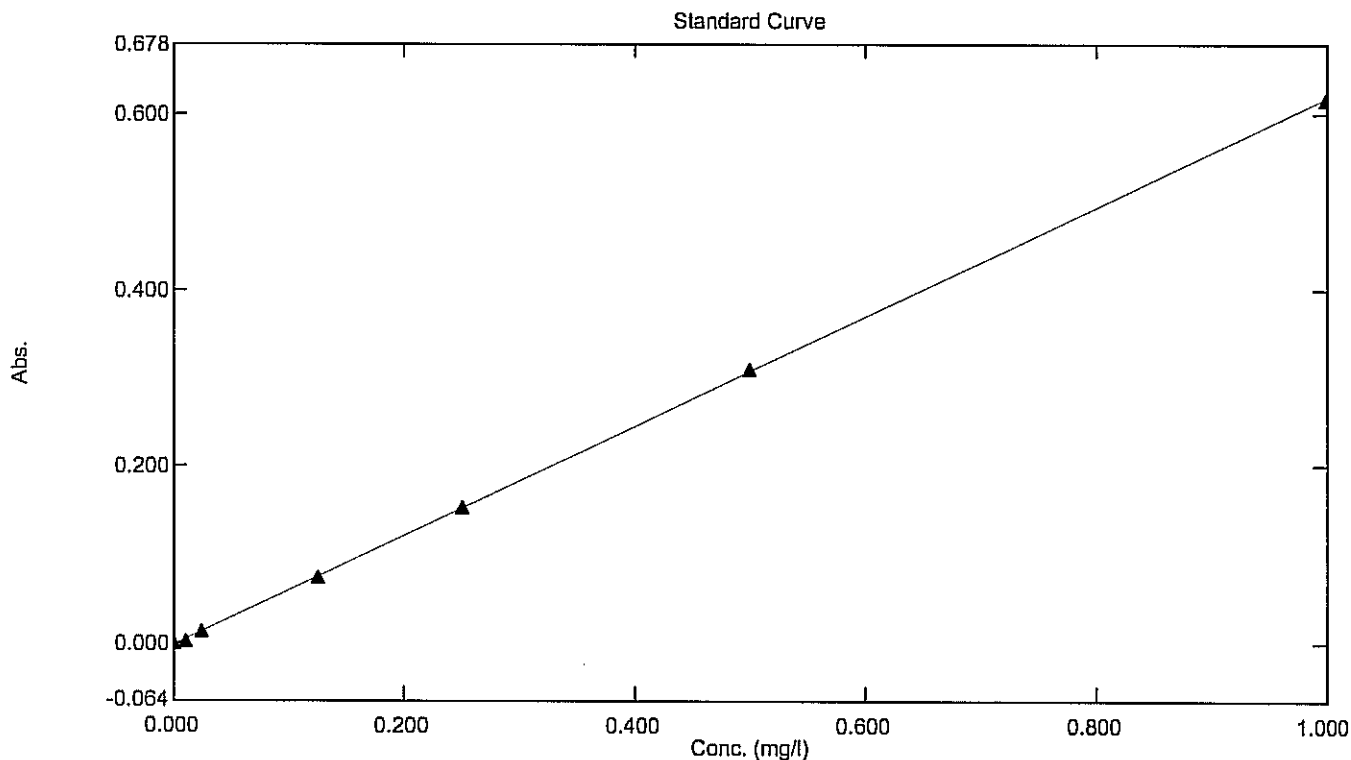
Total Cyanide by SW 9014 Prep by SW9010		SOPs: WC-020		578 nm	Analyst: <i>KPM</i>	Date/Time: 02-22-08 1200		
Water or Soil WO # / SX #	Init Sx Wt or Vol (g / mL)	Final Prep Vol. (mL)	Prep Dil factor	Final Dil factor	Abs.	Init Conc mg/L.	Final Conc. mg/L / mg/Kg	Comments
WBLKSL	1g	50	50x		0.001	-0.00	-0.000	PGC205
WLSL					0.305	0.194	9.7	
0802304-01					0.005	0.002	0.00	
DWP					0.005	0.002	0.00	
MS					0.289	0.184	9.2	
↓					0.005	0.002	0.00	
-02					0.004	0.002	0.00	
-03					0.003	0.001	0.00	
0802318-01					0.002	0.00	0.00	
↓					0.002	0.00	0.00	
-03					0.005	0.002	0.00	
-04					0.005	0.002	0.00	
0802380-01					0.001	-0.00	0.00	
-02					0.004	0.001	0.00	
-03					0.005	0.002	0.00	
-04					0.006	0.002	0.00	
-05					0.003	0.001	0.00	
-06					0.006	0.003	0.00	
-07					0.006	0.002	0.00	
-08					0.006	0.002	0.00	
CCV	50				0.301		0.204	
CCS	↓				-0.000		-0.002	
LCS / ICV ID #: 573-80-1	CN Color reagent ID: 573-98-4		MgCl <sub>2</sub> (2.5M) ID: 573-27-01		Reviewed By: <i>MF</i>			
CCV ID 573-80-7	Chloramine-T ID: 1-746-9-04		NaHPO <sub>4</sub> · H <sub>2</sub> O ID: 51-746-2		2/25/08			

# Standard Table Report

02/28/2008 09:03:44 AM

File Name: C:\Program

Files\Shimadzu\UVProbe\Data\CALIBRATION\PO4\TP-OPO4-CAL-052207.pho



Multiple Correlation Coefficient  $r^2 = 0.99995$

Standard Table

	Sample ID	Type	Ex	Conc	WL880.0	Wgt.Factor	Comments
1	STD1	Standard		0.000	-0.001	1.000	
2	STD2	Standard		0.010	0.002	1.000	
3	STD3	Standard		0.025	0.013	1.000	
4	STD4	Standard		0.125	0.074	1.000	
5	STD5	Standard		0.250	0.154	1.000	
6	STD6	Standard		0.500	0.309	1.000	
7	STD7	Standard		1.000	0.616	1.000	
8							

## Phosphorus Analysis

## ALS Laboratory Group

Method: P-TS SOP #: Date/Time: 02/20/08 10:00 Analyst: J.M.

WO # / SX #	Init Sample Vol (mL) or Wt (grams)	Prep Final Volume (mL)	Anal Dil Factor	Total Dil Factor	Background (A)	Colored Sample (B)	Corr. Abs (B-A)	Corrected Conc. - mg/L (B-A) $\times$ 100	Comments / Batch ID
					Abs.	Conc. mg/L			
W606 w1	1 gr	50 ml		50X		0.000		0.00	P-60110
W606 w1				50X		0.159		0.260	
0802300-01C			5X	250X		0.217		0.355	
0802300-01C			5X	250X		0.213		0.347	
0802300-01C			5X	250X		0.281		0.458	
0802300-02C				50X		0.212		0.345	
0802300-03C			5X	250X		0.122		0.200	
0802300-04C			5X	250X		0.314		0.511	
0802300-05C				50X		0.239		0.389	
0802300-06C				50X		0.508		0.824	
0802300-07C			5X	250X		0.141		0.236	
0802300-08C			5X	250X		0.390		0.634	
0802300-09C			5X	250X		0.151		0.248	
0802300-10C				50X		0.238		0.388	
0802300-11C						0.335		0.544	
0802300-12C						0.001		0.006	
0802300-13C			5X	250X		0.156		0.256	
0802300-14C			5X	250X		0.238		0.387	
0802300-15C				50X		0.173		0.283	
0802300-16C				50X		0.462		0.750	
0802300-17C				50X		0.209		0.342	
0802300-18C									
0802300-19C									
0802300-20C									
0802300-21C									
0802300-22C									
0802300-23C									
0802300-24C									
0802300-25C									
0802300-26C									
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0802300-96C									
0802300-97C									
0802300-98C									
0802300-99C									
0802300-100C									

Reviewed By: J.M.

02-21-08

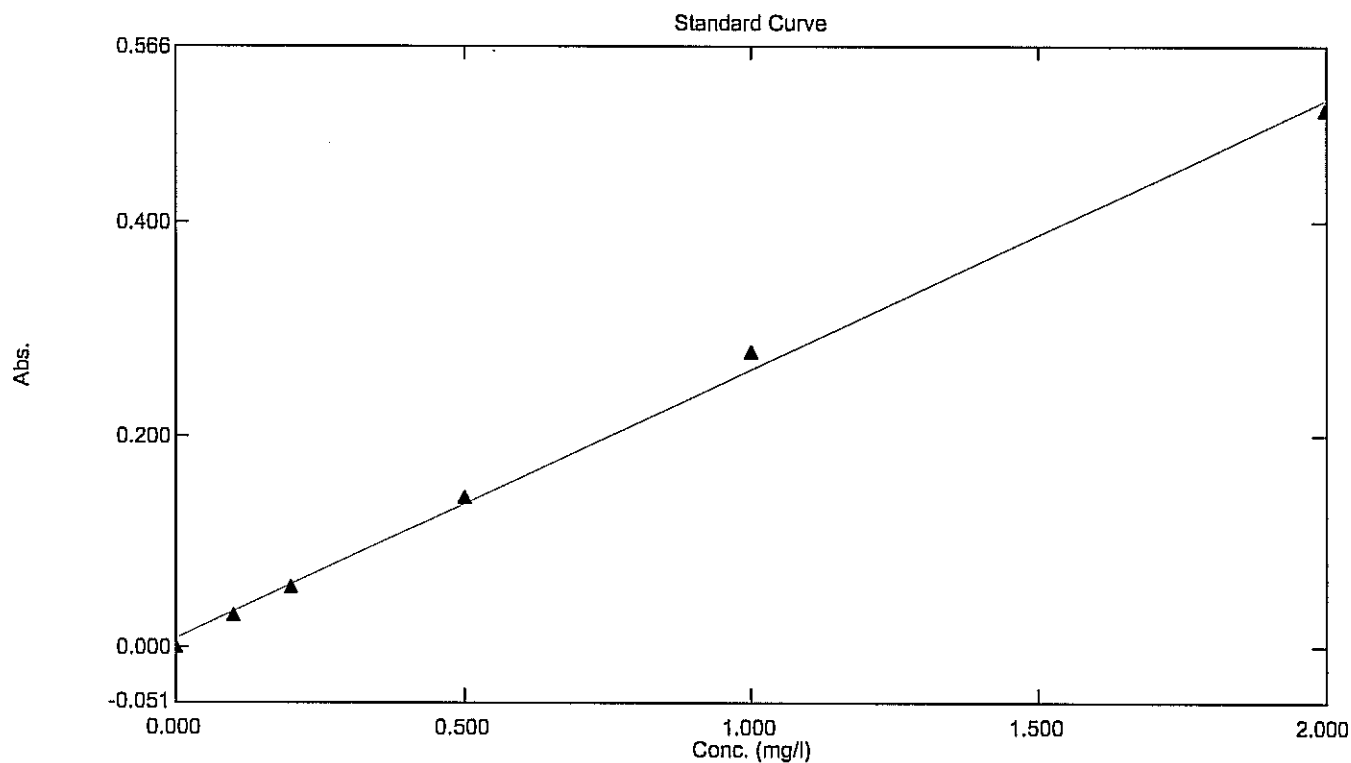
[illegible]

# Standard Table Report

02/29/2008 11:58:08 AM

File Name: C:\Program

Files\Shimadzu\UVProbe\Data\CALIBRATION\SIO2\022608-SiO2-cal.pho



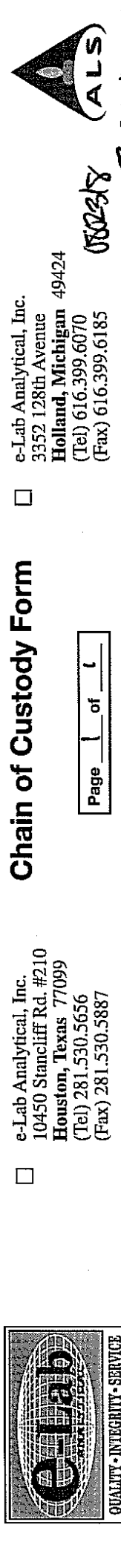
Multiple Correlation Coefficient  $r^2 = 0.99735$

Standard Table

	Sample ID	Type	Ex	Conc	WL815.0	Wgt.Factor	Comments
1	std1	Standard		0.000	0.000	1.000	
2	std2	Standard		0.100	0.029	1.000	
3	std3	Standard		0.200	0.056	1.000	
4	std4	Standard		0.500	0.141	1.000	
5	std5	Standard		1.000	0.278	1.000	
6	std6	Standard		2.000	0.506	1.000	
7							

SiO <sub>2</sub> - S-Soluble		SOP #:			WC-00		Date/Time: 2/26/08		Analyst: ZF	
WO # / SX #	Init Sample Vol (mL) or Wt (grams)	Prep Final Volume (mL)	Anal Dil Factor	Total Dil Factor	Abs.	Init Conc. (mg/L)	Final Conc. (mg/L)	Comments / Batch ID		
WBLKSL-022608	20g	200mL	N/A	10	-0.000	-0.030	0.00	R60293		
LCS ↓					0.138	0.514	5.14			
0802300-01C					0.422	1.631	16.31			
DUP ↓					0.413	1.598	15.98	*MS failed due to MS		
MS ↓					0.522	2.028	20.28			
-02D					0.227	0.865	8.65			
-03C					0.362	1.398	13.98			
-04C					0.476	1.846	18.46			
-05D				✓	0.320	1.232	12.32			
-06C			2	20	0.369	1.425	28.5 28.5 <sup>S</sup>	28.65 <sup>S</sup> 2/26/08		
-07D			2	20	0.263	1.006	20.12			
✓ -08D			N/A	10	0.310	1.193	11.93			
0802304-01D			5	50	0.393	1.519	75.95			
↓ -02D				10	0.473	1.834	18.34			
-03D			2	20	0.462	1.790	35.8			
0802318-01C			2	20	0.429	1.659	33.18			
↓ -02D			2	20	0.266	1.017	20.34			
-03C			5	50	0.486	1.883	94.15			
↓ -04C	✓	✓	10	100	0.505	1.961	196.1			
Cev	50	50	N/A	N/A	0.142		0.529			
Ceb	↓	↓	1746	J	-0.000		-0.032			
LCS / ICV ID #: 1-746-14-03	Reagent ID:	1-746-14-01	Reagent ID:	1-746-13-09	Reviewed By:					
LCS Prep Date: 2/25/08	Prep Date:	2/23/08	Prep Date:	2/23/08						
CCV ID#: 1-746-14-02	Reagent ID:	1-746-14-07	Reagent ID:	1-746-13-3						
CCV Prep Date: 2/25/08	Prep Date:	2/26/08	Prep Date:	2/22/08						

Analyst: TL	Date/Time In: 2/19/2008 12:00pm		Temp In Deg C:		105			
Review By: RPM	Date/Time Out: 2/20/2008 11:00am		Temp Out Deg C:		105			
Method: % Moisture	Batch ID: R60093							
SOP: WC-014 Rev 4								
WO #	Sample Type	Dish	Pan Wt	Wet Wt	1st Wt	2nd Wt	%Moisture	Analyte
0802346-04A	SAMP	1	1.2835	7.0349	5.674	5.676	37.56	Percent Moisture
0802346-04ADUP	DUP	2	1.2881	8.3122	6.5043	6.5072	37.21	Percent Moisture
0802334-01A	SAMP	3	1.2909	7.4107	7.0853	7.083	21.84	Percent Moisture
0802334-02A	SAMP	4	1.2802	5.8542	6.1711	6.1754	16.38	Percent Moisture
0802300-01C	SAMP	5	1.2875	6.0236	7.1688	7.1702	2.34	Percent Moisture
0802300-02C	SAMP	6	1.2984	7.5092	8.6177	8.6201	2.50	Percent Moisture
0802300-03C	SAMP	7	1.2821	7.9869	8.5706	8.5742	8.70	Percent Moisture
0802300-04C	SAMP	8	1.2893	8.7103	8.4197	8.4209	18.12	Percent Moisture
0802300-05C	SAMP	9	1.2932	9.4524	10.5599	10.5609	1.95	Percent Moisture
0802300-06C	SAMP	10	1.2847	7.8588	7.9831	7.9868	14.72	Percent Moisture
0802300-07D	SAMP	11	1.2876	8.2158	9.2586	9.2616	2.94	Percent Moisture
0802300-08C	SAMP	12	1.2844	6.0245	6.8819	6.8848	7.04	Percent Moisture
0802304-01D	SAMP	13	1.2905	8.8326	10.0111	10.0144	1.23	Percent Moisture
0802304-02D	SAMP	14	1.2873	8.2096	9.3381	9.3408	1.90	Percent Moisture
0802304-03D	SAMP	15	1.2922	8.0357	9.2209	9.2241	1.29	Percent Moisture
0802318-01C	SAMP	16	1.2954	6.9431	8.0428	8.0447	2.79	Percent Moisture
0802318-02C	SAMP	17	1.2937	7.1616	7.0237	7.0253	19.97	Percent Moisture
0802318-03C	SAMP	18	1.2879	6.7486	7.6419	7.6441	5.81	Percent Moisture
0802318-04C	SAMP	19	1.2952	6.9371	7.6494	7.6508	8.88	Percent Moisture
0802318-04CDUP	DUP	20	1.2947	6.9404	7.6683	7.6711	8.13	Percent Moisture
	SAMP	21					#DIV/0!	Percent Moisture
	DUP	22					#DIV/0!	Percent Moisture
							#DIV/0!	Percent Moisture
							#DIV/0!	Percent Moisture



Chain of Custody Form

Project Information

Customer Information

Sample Description

Shipment Method

Results Due Date

QC Package

Notes

1. Any changes must be made in writing once samples and COC Form have been submitted to e-Lab Analytical, Inc.

2. Unless otherwise agreed in a formal contract, services provided by e-Lab Analytical, Inc. are expressly limited to the terms and conditions stated on the reverse.

2. Unless otherwise agreed in a formal contract, services provided by e-Lab Analytical, Inc. are expressly limited to the terms and conditions stated on the reverse.



## Sample Receipt Checklist

Client Name: MALCOLM PIRNIEDate/Time Received: 2/15/2008 9:15:00 AMWork Order Number 0802318Received by: RNG

Checklist completed by

Signature

Date

Reviewed by

Initials

Date

Matrix:

Carrier name: FedEx

Shipping container/cooler in good condition?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	Not Present <input type="checkbox"/>
Custody seals intact on shipping container/cooler?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	Not Present <input type="checkbox"/>
Custody seals intact on sample bottles?	Yes <input type="checkbox"/>	No <input type="checkbox"/>	Not Present <input checked="" type="checkbox"/>
Chain of custody present?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Chain of custody signed when relinquished and received?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Chain of custody agrees with sample labels?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Samples in proper container/bottle?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Sample containers intact?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Sufficient sample volume for indicated test?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
All samples received within holding time?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Container/Temp Blank temperature in compliance?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Temperature(s)/Thermometer(s):	<u>2.0,1.8,2.2,2.4,1.9c 002</u>		
Cooler(s)/Kit(s):			
Water - VOA vials have zero headspace?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	No VOA vials submitted <input type="checkbox"/>
Water - pH acceptable upon receipt?	Yes <input type="checkbox"/>	No <input type="checkbox"/>	N/A <input checked="" type="checkbox"/>

Adjusted?

Checked by

Login Notes: Trip Blank logged in without analysis.

Client contacted: .....

Date contacted:

Person contacted

Contacted by: .....

Regarding: .....

Comments: .....

Corrective Action

Part # 156297-435 RIT 12/07

0002/0005 FRI - 15 FEB A2

PRIORITY OVERNIGHT

NPS#

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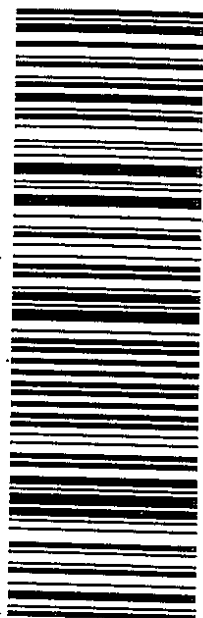
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770999

TX-US

IAH

**XH JGQA**



Part # 156297-435 RIT 12/07

FedEx 0004/0005 FRI - 15 FEB A2

PRIORITY OVERNIGHT

NPS#

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Mstr# 8641 7065 1889 0215

1336

770999

TX-US

IAH

**XH JGQA**



Part # 156297-435 RIT 12/07

FedEx 0003/0005 FRI - 15 FEB A2

PRIORITY OVERNIGHT

NPS#

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Mstr# 8641 7065 1889 0215

1306

770999

TX-US

IAH

**XH JGQA**



emp# 40322 14FEB08 13:37

Part # 156297-435 RIT 12/07

FedEx 0005/0005 FRI - 15 FEB A2

PRIORITY OVERNIGHT

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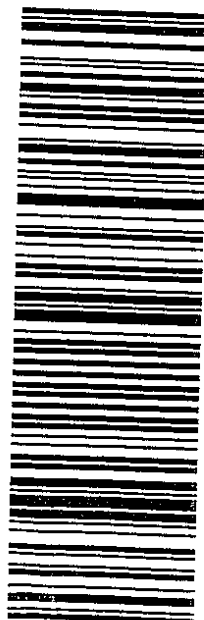
1058

770999

TX-US

IAH


**XH JGQA**




emp# 40322 14FEB08 13:37

W.D.# 156297


W/0802318

	<b>ALS e-Lab Analytical</b>	<b>MPI</b> <b>SOILS</b> <b>3 OF 3</b>
	10450 Stancliff Rd., Suite 210	
	Houston, Texas 77099	
	Tel. 281.530.5656 Fax. 218.530.5887	

<b>2356 CUSTODY SEAL</b>		<b>RVG</b> Seal Broken By:  Date: <b>2/15/08</b>
Date: <b>2-14-08</b>	Time: <b>1500</b>	
Name: <b>BOB A.</b>		
Company: <b>MPI</b>		


	<b>ALS e-Lab Analytical</b>	<b>MPI</b> <b>SOIL</b> <b>1 OF 3</b>
	10450 Stancliff Rd., Suite 210	
	Houston, Texas 77099	
	Tel. 281.530.5656 Fax. 218.530.5887	

<b>2058 CUSTODY SEAL</b>		<b>RVG</b> Seal Broken By:  Date: <b>2/15/08</b>
Date: <b>2/14/08</b>	Time: <b>10:00</b>	
Name: <b>Colin Nelson</b>		
Company: <b>Malcolm Pirnie</b>		

	<b>ALS e-Lab Analytical</b>	<b>MPI</b> <b>SOILS</b> <b>2 OF 3</b>
	10450 Stancliff Rd., Suite 210	
	Houston, Texas 77099	
	Tel. 281.530.5656 Fax. 218.530.5887	

<b>2672 CUSTODY SEAL</b>	
Date: <b>2-14-08</b>	Time: <b>150</b>
Name: <b>JOE A.</b>	
Company: <b>MPI</b>	

**RVG**  
**2/15/08**

	<b>ALS e-Lab Analytical</b>	<b>RINS</b>
	10450 Stancliff Rd., Suite 210	
	Houston, Texas 77099	
	Tel. 281.530.5656 Fax. 218.530.5887	

<b>ATE-2 CUSTODY SEAL 1376</b>		<b>RVG</b> Seal Broken By:  Date: <b>2/15/08</b>
Date: <b>2/14/08</b>	Time: <b>6:10 a</b>	
Name: <b>Colin Nelson</b>		
Company: <b>Malcolm Pirnie</b>		

W11# 0802318

ALL INFORMATION CONTAINED HEREIN IS UNCLASSIFIED  
DATE 2-14-08 BY [redacted] FedEx Tracking Number 864170651889

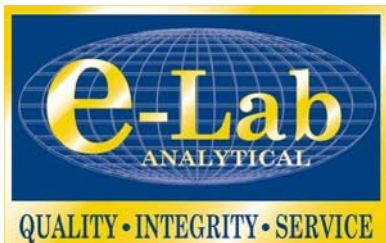
Sender's Name Joe Mazzocchi Phone 317 340 2571

Company [redacted]

Address 1701 [redacted] 4750  
Dept/Floor/Suite/Room

City [redacted] State IN ZIP 46107

Our Internal Billing Reference [redacted] 2672



February 28, 2008

Michael Forlenza  
Malcolm Pirnie, Inc.  
1700 West Loop South  
Suite 1450  
Houston, TX 77027

Tel: (713) 840-1511  
Fax: (713) 840-1207

Re: Oro grande LF-Derived Waste

Work Order : **0802327**

Dear Michael Forlenza,

e-Lab Analytical, Inc. received 2 samples on 2/18/2008 07:30 AM for the analyses presented in the following report.

The analytical data provided relates directly to the samples received by e-Lab Analytical, Inc. and for only the analyses requested. Results are expressed as "as received" unless otherwise noted.

QC sample results for this data met EPA or laboratory specifications except as noted in the Case Narrative or as noted with qualifiers in the QC batch information. Should this laboratory report need to be reproduced, it should be reproduced in full unless written approval has been obtained by e-Lab Analytical, Inc. Samples will be disposed in 30 days unless storage arrangements are made.

The total number of pages in this report is 144.

If you have any questions regarding this report, please feel free to call me.

Sincerely,

Electronically approved by: Glenda H. Ramos

Ed B. Fry  
Project Manager



Certificate No: T104704231-06-TX

**e.Lab Analytical, Inc.**  
Part of the **ALS Laboratory Group**  
10450 Stancliff Rd, Suite 210 Houston, Texas 77099-4338  
Phone: (281) 530-5656 Fax: (281) 530-5887  
[www.elabi.com](http://www.elabi.com) [www.alsglobal.com](http://www.alsglobal.com)  
*A Campbell Brothers Limited Company*

---

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro grande LF-Derived Waste  
**Work Order:** 0802327

**Work Order Sample Summary**

---

<u>Lab Samp ID</u>	<u>Client Sample ID</u>	<u>Matrix</u>	<u>Tag Number</u>	<u>Collection Date</u>	<u>Date Received</u>	<u>Hold</u>
0802327-01	IDW-AQ	Water		2/15/2008 12:00	2/18/2008 07:30	<input type="checkbox"/>
0802327-02	Trip Blank	Water		2/15/2008 12:00	2/18/2008 07:30	<input type="checkbox"/>

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro grande LF-Derived Waste  
**Work Order:** 0802327

**Case Narrative**

---

Pesticides , sample IDW-AQ results are "P" qualified for beta-BHC due to matrix interference.

Batch 28298, Herbicides, LCS/LCSD are "P" qualified for Dalpon due to coelution on the confirming column. Results are reported from the non-coeluting column.

Batch R60091, Volatile Organics, Sample 0802352-01 : MS/MSD is an unrelated sample.

# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro grande LF-Derived Waste  
**Sample ID:** IDW-AQ  
**Collection Date:** 2/15/2008 12:00:00 PM

**Work Order:** 0802327  
**Lab ID:** 0802327-01  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>MISCELLANEOUS PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3510B / 2/19/08		Analyst: <b>JLJ</b>
alpha-Chlordane	U		0.010	0.050	µg/L	1	2/19/2008
gamma-Chlordane	U		0.010	0.050	µg/L	1	2/19/2008
<b>ORGANOCHLORINE PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3510B / 2/19/08		Analyst: <b>JLJ</b>
4,4'-DDD	U		0.012	0.10	µg/L	1	2/19/2008
4,4'-DDE	U		0.010	0.10	µg/L	1	2/19/2008
<b>4,4'-DDT</b>	<b>0.58</b>		<b>0.011</b>	<b>0.10</b>	<b>µg/L</b>	1	2/19/2008
Aldrin	U		0.010	0.050	µg/L	1	2/19/2008
<b>alpha-BHC</b>	<b>0.063</b>		<b>0.010</b>	<b>0.050</b>	<b>µg/L</b>	1	2/19/2008
<b>beta-BHC</b>	<b>0.027</b>	JP	<b>0.010</b>	<b>0.050</b>	<b>µg/L</b>	1	2/19/2008
Chlordane	U		0.030	0.50	µg/L	1	2/19/2008
<b>delta-BHC</b>	<b>0.079</b>		<b>0.010</b>	<b>0.050</b>	<b>µg/L</b>	1	2/19/2008
Dieldrin	U		0.010	0.10	µg/L	1	2/19/2008
Endosulfan I	U		0.010	0.050	µg/L	1	2/19/2008
Endosulfan II	U		0.011	0.10	µg/L	1	2/19/2008
Endosulfan sulfate	U		0.012	0.10	µg/L	1	2/19/2008
Endrin	U		0.012	0.10	µg/L	1	2/19/2008
Endrin aldehyde	U		0.013	0.10	µg/L	1	2/19/2008
Endrin ketone	U		0.010	0.10	µg/L	1	2/19/2008
<b>gamma-BHC</b>	<b>0.062</b>		<b>0.010</b>	<b>0.050</b>	<b>µg/L</b>	1	2/19/2008
Heptachlor	U		0.010	0.050	µg/L	1	2/19/2008
<b>Heptachlor epoxide</b>	<b>0.36</b>		<b>0.010</b>	<b>0.050</b>	<b>µg/L</b>	1	2/19/2008
Methoxychlor	U		0.080	0.50	µg/L	1	2/19/2008
Toxaphene	U		0.20	0.50	µg/L	1	2/19/2008
Surr: Decachlorobiphenyl	111			54.9-145	%REC	1	2/19/2008
Surr: Tetrachloro-m-xylene	111			51.5-142	%REC	1	2/19/2008
<b>CHLORINATED HERBICIDES</b>							
			Method: <b>SW8151</b>		Prep: SW3510B / 2/19/08		Analyst: <b>JLJ</b>
2,4,5-T	U		0.050	0.10	µg/L	1	2/20/2008
2,4,5-TP (Silvex)	U		0.020	0.10	µg/L	1	2/20/2008
2,4-D	U		0.080	0.20	µg/L	1	2/20/2008
2,4-DB	U		0.070	0.20	µg/L	1	2/20/2008
Dalapon	U		0.050	0.10	µg/L	1	2/20/2008
Dicamba	U		0.050	0.10	µg/L	1	2/20/2008
Dichlorprop	U		0.070	0.20	µg/L	1	2/20/2008
Dinoseb	U		0.030	0.10	µg/L	1	2/20/2008
MCPA	U		3.0	20	µg/L	1	2/20/2008
MCPP	U		7.0	20	µg/L	1	2/20/2008
Surr: DCAA	108			50-130	%REC	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

AR Page 1 of 7



# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro grande LF-Derived Waste  
**Sample ID:** IDW-AQ  
**Collection Date:** 2/15/2008 12:00:00 PM

**Work Order:** 0802327  
**Lab ID:** 0802327-01  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3510B / 2/19/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1221	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1232	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1242	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1248	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1254	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1260	U		0.20	0.500	µg/L	1	2/19/2008
Surr: Decachlorobiphenyl	109			54-140	%REC	1	2/19/2008
Surr: Tetrachloro-m-xylene	104			53-137	%REC	1	2/19/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3510C / 2/19/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	0.74		0.020	0.050	mg/L	1	2/22/2008
Surr: 2-Fluorobiphenyl	86.0			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL - SW 7470A</b>							
			Method: <b>SW7470</b>		Prep: SW7470 / 2/22/08		Analyst: <b>JCJ</b>
Mercury	U		0.000042	0.000200	mg/L	1	2/22/2008
<b>ICP METALS, TOTAL - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3010A / 2/20/08		Analyst: <b>ALR</b>
Arsenic	0.00926		0.0018	0.00500	mg/L	1	2/20/2008
Barium	0.347		0.00060	0.00500	mg/L	1	2/20/2008
Cadmium	U		0.00015	0.00200	mg/L	1	2/20/2008
Chromium	0.0127		0.00050	0.00500	mg/L	1	2/20/2008
Lead	0.00814		0.00020	0.00500	mg/L	1	2/20/2008
Selenium	0.00290	J	0.0017	0.00500	mg/L	1	2/20/2008
Silver	U		0.00020	0.00500	mg/L	1	2/20/2008
<b>LOW-LEVEL TCL SEMIVOLATILE ORGANICS</b>							
			Method: <b>SW8270</b>		Prep: SW3510 / 2/19/08		Analyst: <b>LG</b>
1,1'-Biphenyl	U		0.20	0.20	µg/L	1	2/20/2008
2,4,5-Trichlorophenol	U		0.060	0.20	µg/L	1	2/20/2008
2,4,6-Trichlorophenol	U		0.070	0.20	µg/L	1	2/20/2008
2,4-Dichlorophenol	U		0.090	0.20	µg/L	1	2/20/2008
2,4-Dimethylphenol	U		0.080	0.20	µg/L	1	2/20/2008
2,4-Dinitrophenol	U		1.0	1.0	µg/L	1	2/20/2008
2,4-Dinitrotoluene	U		0.060	0.20	µg/L	1	2/20/2008
2,6-Dinitrotoluene	U		0.070	0.20	µg/L	1	2/20/2008
2-Chloronaphthalene	U		0.070	0.20	µg/L	1	2/20/2008
2-Chlorophenol	U		0.090	0.20	µg/L	1	2/20/2008
2-Methylnaphthalene	U		0.090	0.20	µg/L	1	2/20/2008
2-Methylphenol	U		0.10	0.20	µg/L	1	2/20/2008
2-Nitroaniline	U		0.070	0.20	µg/L	1	2/20/2008
2-Nitrophenol	U		0.070	0.20	µg/L	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro grande LF-Derived Waste  
**Sample ID:** IDW-AQ  
**Collection Date:** 2/15/2008 12:00:00 PM

**Work Order:** 0802327  
**Lab ID:** 0802327-01  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
3&4-Methylphenol	U		0.10	0.20	µg/L	1	2/20/2008
3,3'-Dichlorobenzidine	U		0.070	0.20	µg/L	1	2/20/2008
3-Nitroaniline	U		0.050	0.20	µg/L	1	2/20/2008
4,6-Dinitro-2-methylphenol	U		0.060	0.20	µg/L	1	2/20/2008
4-Bromophenyl phenyl ether	U		0.11	0.20	µg/L	1	2/20/2008
4-Chloro-3-methylphenol	U		0.10	0.20	µg/L	1	2/20/2008
4-Chloroaniline	U		0.050	0.20	µg/L	1	2/20/2008
4-Chlorophenyl phenyl ether	U		0.060	0.20	µg/L	1	2/20/2008
4-Nitroaniline	U		0.050	0.20	µg/L	1	2/20/2008
4-Nitrophenol	U		0.060	1.0	µg/L	1	2/20/2008
Acenaphthene	U		0.070	0.20	µg/L	1	2/20/2008
Acenaphthylene	U		0.080	0.20	µg/L	1	2/20/2008
Acetophenone	U		0.20	0.20	µg/L	1	2/20/2008
Anthracene	U		0.080	0.20	µg/L	1	2/20/2008
Atrazine	U		0.20	0.20	µg/L	1	2/20/2008
Benz(a)anthracene	U		0.070	0.20	µg/L	1	2/20/2008
Benzaldehyde	U		0.20	0.20	µg/L	1	2/20/2008
Benzo(a)pyrene	U		0.080	0.20	µg/L	1	2/20/2008
Benzo(b)fluoranthene	U		0.070	0.20	µg/L	1	2/20/2008
Benzo(g,h,i)perylene	U		0.11	0.20	µg/L	1	2/20/2008
Benzo(k)fluoranthene	U		0.070	0.20	µg/L	1	2/20/2008
Bis(2-chloroethoxy)methane	U		0.080	0.20	µg/L	1	2/20/2008
Bis(2-chloroethyl)ether	U		0.080	0.20	µg/L	1	2/20/2008
Bis(2-chloroisopropyl)ether	U		0.090	0.20	µg/L	1	2/20/2008
<b>Bis(2-ethylhexyl)phthalate</b>	<b>4.0</b>		<b>0.11</b>	<b>0.20</b>	<b>µg/L</b>	1	2/20/2008
Butyl benzyl phthalate	U		0.090	0.20	µg/L	1	2/20/2008
<b>Caprolactam</b>	<b>0.74</b>		<b>0.20</b>	<b>0.20</b>	<b>µg/L</b>	1	2/20/2008
Carbazole	U		0.080	0.20	µg/L	1	2/20/2008
Chrysene	U		0.090	0.20	µg/L	1	2/20/2008
<b>Di-n-butyl phthalate</b>	<b>0.29</b>		<b>0.11</b>	<b>0.20</b>	<b>µg/L</b>	1	2/20/2008
Di-n-octyl phthalate	U		0.070	0.20	µg/L	1	2/20/2008
Dibenz(a,h)anthracene	U		0.090	0.20	µg/L	1	2/20/2008
Dibenzofuran	U		0.070	0.20	µg/L	1	2/20/2008
Diethyl phthalate	U		0.060	0.20	µg/L	1	2/20/2008
Dimethyl phthalate	U		0.060	0.20	µg/L	1	2/20/2008
Fluoranthene	U		0.090	0.20	µg/L	1	2/20/2008
Fluorene	U		0.070	0.20	µg/L	1	2/20/2008
Hexachlorobenzene	U		0.10	0.20	µg/L	1	2/20/2008
Hexachlorobutadiene	U		0.070	0.20	µg/L	1	2/20/2008
Hexachlorocyclopentadiene	U		0.070	0.20	µg/L	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro grande LF-Derived Waste  
**Sample ID:** IDW-AQ  
**Collection Date:** 2/15/2008 12:00:00 PM

**Work Order:** 0802327  
**Lab ID:** 0802327-01  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Hexachloroethane	U		0.090	0.20	µg/L	1	2/20/2008
Indeno(1,2,3-cd)pyrene	U		0.060	0.20	µg/L	1	2/20/2008
Isophorone	U		0.080	0.20	µg/L	1	2/20/2008
N-Nitrosodi-n-propylamine	U		0.10	0.20	µg/L	1	2/20/2008
N-Nitrosodiphenylamine	U		0.080	0.20	µg/L	1	2/20/2008
Naphthalene	U		0.070	0.20	µg/L	1	2/20/2008
Nitrobenzene	U		0.070	0.20	µg/L	1	2/20/2008
Pentachlorophenol	U		0.070	0.20	µg/L	1	2/20/2008
Phenanthrene	U		0.080	0.20	µg/L	1	2/20/2008
Phenol	U		0.090	0.20	µg/L	1	2/20/2008
Pyrene	U		0.090	0.20	µg/L	1	2/20/2008
Surr: 2,4,6-Tribromophenol	68.6			34-129	%REC	1	2/20/2008
Surr: 2-Fluorobiphenyl	72.8			48-115	%REC	1	2/20/2008
Surr: 2-Fluorophenol	58.9			32-115	%REC	1	2/20/2008
Surr: 4-Terphenyl-d14	73.8			44-117	%REC	1	2/20/2008
Surr: Nitrobenzene-d5	66.7			44-115	%REC	1	2/20/2008
Surr: Phenol-d6	71.1			21-119	%REC	1	2/20/2008

## TCL VOLATILE ORGANICS

Method: SW8260

Analyst: PC

1,1,1-Trichloroethane	U		0.60	5.0	µg/L	1	2/19/2008
1,1,2,2-Tetrachloroethane	U		1.5	5.0	µg/L	1	2/19/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		1.0	5.0	µg/L	1	2/19/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,1-Dichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,1-Dichloroethene	U		0.60	5.0	µg/L	1	2/19/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/L	1	2/19/2008
1,2-Dibromo-3-chloropropane	U		1.8	5.0	µg/L	1	2/19/2008
1,2-Dibromoethane	U		0.50	5.0	µg/L	1	2/19/2008
1,2-Dichlorobenzene	U		0.90	5.0	µg/L	1	2/19/2008
1,2-Dichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,2-Dichloropropane	U		0.70	5.0	µg/L	1	2/19/2008
1,3-Dichlorobenzene	U		1.0	5.0	µg/L	1	2/19/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/L	1	2/19/2008
2-Butanone	U		0.80	10	µg/L	1	2/19/2008
2-Hexanone	U		2.5	10	µg/L	1	2/19/2008
4-Methyl-2-pentanone	U		1.6	10	µg/L	1	2/19/2008
Acetone	U		2.5	10	µg/L	1	2/19/2008
Benzene	U		0.60	5.0	µg/L	1	2/19/2008
Bromodichloromethane	U		0.50	5.0	µg/L	1	2/19/2008
<b>Bromoform</b>	<b>6.8</b>		<b>0.80</b>	<b>5.0</b>	<b>µg/L</b>	1	2/19/2008
Bromomethane	U		0.50	5.0	µg/L	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro grande LF-Derived Waste  
**Sample ID:** IDW-AQ  
**Collection Date:** 2/15/2008 12:00:00 PM

**Work Order:** 0802327  
**Lab ID:** 0802327-01  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Carbon disulfide	U		0.70	10	µg/L	1	2/19/2008
Carbon tetrachloride	U		0.60	5.0	µg/L	1	2/19/2008
Chlorobenzene	U		0.50	5.0	µg/L	1	2/19/2008
Chloroethane	U		0.60	5.0	µg/L	1	2/19/2008
<b>Chloroform</b>	<b>0.64</b>	<b>J</b>	<b>0.50</b>	<b>5.0</b>	<b>µg/L</b>	<b>1</b>	<b>2/19/2008</b>
Chloromethane	U		0.50	5.0	µg/L	1	2/19/2008
cis-1,2-Dichloroethene	U		0.50	5.0	µg/L	1	2/19/2008
cis-1,3-Dichloropropene	U		0.50	5.0	µg/L	1	2/19/2008
Cyclohexane	U		0.80	5.0	µg/L	1	2/19/2008
<b>Dibromochloromethane</b>	<b>5.1</b>		<b>0.50</b>	<b>5.0</b>	<b>µg/L</b>	<b>1</b>	<b>2/19/2008</b>
Dichlorodifluoromethane	U		0.50	5.0	µg/L	1	2/19/2008
Dichloromethane	U		0.60	10	µg/L	1	2/19/2008
Ethylbenzene	U		0.50	5.0	µg/L	1	2/19/2008
Isopropylbenzene	U		0.70	5.0	µg/L	1	2/19/2008
Methyl acetate	U		2.0	5.0	µg/L	1	2/19/2008
Methyl tert-butyl ether	U		0.50	5.0	µg/L	1	2/19/2008
Methylcyclohexane	U		0.70	5.0	µg/L	1	2/19/2008
Styrene	U		0.50	5.0	µg/L	1	2/19/2008
Tetrachloroethene	U		0.50	5.0	µg/L	1	2/19/2008
Toluene	U		0.50	5.0	µg/L	1	2/19/2008
trans-1,2-Dichloroethene	U		0.60	5.0	µg/L	1	2/19/2008
trans-1,3-Dichloropropene	U		0.50	5.0	µg/L	1	2/19/2008
Trichloroethene	U		0.70	5.0	µg/L	1	2/19/2008
Trichlorofluoromethane	U		0.50	5.0	µg/L	1	2/19/2008
Vinyl chloride	U		0.60	2.0	µg/L	1	2/19/2008
Xylenes, Total	U		1.5	15	µg/L	1	2/19/2008
Surr: 1,2-Dichloroethane-d4	89.6			70-125	%REC	1	2/19/2008
Surr: 4-Bromofluorobenzene	81.1			72-125	%REC	1	2/19/2008
Surr: Dibromofluoromethane	91.8			71-125	%REC	1	2/19/2008
Surr: Toluene-d8	87.3			75-125	%REC	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected  
J - Analyte detected below quantitation limits  
B - Analyte detected in the associated Method Blank  
\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits  
P - Dual Column results RPD > 40%  
E - Value above quantitation range  
H - Analyzed outside of Hold Time

AR Page 5 of 7

**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro grande LF-Derived Waste  
**Sample ID:** Trip Blank  
**Collection Date:** 2/15/2008 12:00:00 PM

**Work Order:** 0802327  
**Lab ID:** 0802327-02  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>			Analyst: <b>PC</b>	
1,1,1-Trichloroethane	U		0.60	5.0	µg/L	1	2/19/2008
1,1,2,2-Tetrachloroethane	U		1.5	5.0	µg/L	1	2/19/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		1.0	5.0	µg/L	1	2/19/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,1-Dichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,1-Dichloroethene	U		0.60	5.0	µg/L	1	2/19/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/L	1	2/19/2008
1,2-Dibromo-3-chloropropane	U		1.8	5.0	µg/L	1	2/19/2008
1,2-Dibromoethane	U		0.50	5.0	µg/L	1	2/19/2008
1,2-Dichlorobenzene	U		0.90	5.0	µg/L	1	2/19/2008
1,2-Dichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,2-Dichloropropane	U		0.70	5.0	µg/L	1	2/19/2008
1,3-Dichlorobenzene	U		1.0	5.0	µg/L	1	2/19/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/L	1	2/19/2008
2-Butanone	U		0.80	10	µg/L	1	2/19/2008
2-Hexanone	U		2.5	10	µg/L	1	2/19/2008
4-Methyl-2-pentanone	U		1.6	10	µg/L	1	2/19/2008
Acetone	U		2.5	10	µg/L	1	2/19/2008
Benzene	U		0.60	5.0	µg/L	1	2/19/2008
Bromodichloromethane	U		0.50	5.0	µg/L	1	2/19/2008
Bromoform	U		0.80	5.0	µg/L	1	2/19/2008
Bromomethane	U		0.50	5.0	µg/L	1	2/19/2008
Carbon disulfide	U		0.70	10	µg/L	1	2/19/2008
Carbon tetrachloride	U		0.60	5.0	µg/L	1	2/19/2008
Chlorobenzene	U		0.50	5.0	µg/L	1	2/19/2008
Chloroethane	U		0.60	5.0	µg/L	1	2/19/2008
Chloroform	U		0.50	5.0	µg/L	1	2/19/2008
Chloromethane	U		0.50	5.0	µg/L	1	2/19/2008
cis-1,2-Dichloroethene	U		0.50	5.0	µg/L	1	2/19/2008
cis-1,3-Dichloropropene	U		0.50	5.0	µg/L	1	2/19/2008
Cyclohexane	U		0.80	5.0	µg/L	1	2/19/2008
Dibromochloromethane	U		0.50	5.0	µg/L	1	2/19/2008
Dichlorodifluoromethane	U		0.50	5.0	µg/L	1	2/19/2008
Dichloromethane	U		0.60	10	µg/L	1	2/19/2008
Ethylbenzene	U		0.50	5.0	µg/L	1	2/19/2008
Isopropylbenzene	U		0.70	5.0	µg/L	1	2/19/2008
Methyl acetate	U		2.0	5.0	µg/L	1	2/19/2008
Methyl tert-butyl ether	U		0.50	5.0	µg/L	1	2/19/2008
Methylcyclohexane	U		0.70	5.0	µg/L	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro grande LF-Derived Waste  
**Sample ID:** Trip Blank  
**Collection Date:** 2/15/2008 12:00:00 PM

**Work Order:** 0802327  
**Lab ID:** 0802327-02  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Styrene	U		0.50	5.0	µg/L	1	2/19/2008
Tetrachloroethene	U		0.50	5.0	µg/L	1	2/19/2008
Toluene	U		0.50	5.0	µg/L	1	2/19/2008
trans-1,2-Dichloroethene	U		0.60	5.0	µg/L	1	2/19/2008
trans-1,3-Dichloropropene	U		0.50	5.0	µg/L	1	2/19/2008
Trichloroethene	U		0.70	5.0	µg/L	1	2/19/2008
Trichlorofluoromethane	U		0.50	5.0	µg/L	1	2/19/2008
Vinyl chloride	U		0.60	2.0	µg/L	1	2/19/2008
Xylenes, Total	U		1.5	15	µg/L	1	2/19/2008
Surr: 1,2-Dichloroethane-d4	89.5			70-125	%REC	1	2/19/2008
Surr: 4-Bromofluorobenzene	85.1			72-125	%REC	1	2/19/2008
Surr: Dibromofluoromethane	92.0			71-125	%REC	1	2/19/2008
Surr: Toluene-d8	92.7			75-125	%REC	1	2/19/2008

**Qualifiers:**

U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

AR Page 7 of 7

## e-Lab Analytical, Inc.

Date: Feb 28 2008

CLIENT: Malcolm Pirnie, Inc.

## QC BATCH REPORT

Work Order: 0802327

Project: Oro grande LF-Derived Waste

Batch ID: 28296

Instrument ID ECD\_1

Method: SW8081

MBLK		Sample ID: PBLKW1-080219			Units: µg/L		Analysis Date: 02/19/08 20:17			
Client ID:		Run ID: ECD_1_080218E			SeqNo: 1335914		Prep Date: 2/19/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	U	0.10								
4,4'-DDE	U	0.10								
4,4'-DDT	U	0.10								
Aldrin	U	0.050								
alpha-BHC	U	0.050								
beta-BHC	U	0.050								
Chlordane	U	0.50								
delta-BHC	U	0.050								
Dieldrin	U	0.10								
Endosulfan I	U	0.050								
Endosulfan II	U	0.10								
Endosulfan sulfate	U	0.10								
Endrin	U	0.10								
Endrin aldehyde	U	0.10								
Endrin ketone	U	0.10								
gamma-BHC	U	0.050								
Heptachlor	U	0.050								
Heptachlor epoxide	U	0.050								
Methoxychlor	U	0.50								
Toxaphene	U	0.50								
Surr: Decachlorobiphenyl	0.1662	0.10	0.2	0	83.1	54.9-145	0			
Surr: Tetrachloro-m-xylene	0.1544	0.050	0.2	0	77.2	51.5-142	0			

MBLK		Sample ID: PBLKW1-080219			Units: µg/L		Analysis Date: 02/19/08 20:17			
Client ID:		Run ID: ECD_1_080218E			SeqNo: 1335920		Prep Date: 2/19/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	U	0.050								
gamma-Chlordane	U	0.050								

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is &gt; 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference &gt; 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 1 of 24

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

## QC BATCH REPORT

Batch ID: **28296** Instrument ID **ECD\_1** Method: **SW8081**

LCS		Sample ID: <b>PLCSW1-080219</b>			Units: <b>µg/L</b>			Analysis Date: <b>02/19/08 20:51</b>		
Client ID:		Run ID: <b>ECD_1_080218E</b>			SeqNo: <b>1335915</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	0.4044	0.10	0.5	0	80.9	53-144	0			
4,4'-DDE	0.3997	0.10	0.5	0	79.9	55-144	0			
4,4'-DDT	0.3832	0.10	0.5	0	76.6	53-149	0			
Aldrin	0.1928	0.050	0.25	0	77.1	47-141	0			
alpha-BHC	0.2031	0.050	0.25	0	81.2	51-141	0			
beta-BHC	0.1995	0.050	0.25	0	79.8	58-144	0			
delta-BHC	0.1974	0.050	0.25	0	79	48-146	0			
Dieldrin	0.408	0.10	0.5	0	81.6	56-144	0			
Endosulfan I	0.2034	0.050	0.25	0	81.4	55-141	0			
Endosulfan II	0.4053	0.10	0.5	0	81.1	57-144	0			
Endosulfan sulfate	0.4111	0.10	0.5	0	82.2	58-145	0			
Endrin	0.4687	0.10	0.5	0	93.7	60-163	0			
Endrin aldehyde	0.4371	0.10	0.5	0	87.4	59-158	0			
Endrin ketone	0.4268	0.10	0.5	0	85.4	59-154	0			
gamma-BHC	0.2047	0.050	0.25	0	81.9	53-142	0			
Heptachlor	0.2069	0.050	0.25	0	82.7	51-144	0			
Heptachlor epoxide	0.1987	0.050	0.25	0	79.5	55-142	0			
Methoxychlor	2.113	0.50	2.5	0	84.5	59-150	0			
Surr: Decachlorobiphenyl	0.1757	0.10	0.2	0	87.9	61-154	0			
Surr: Tetrachloro-m-xylene	0.1654	0.050	0.2	0	82.7	60-144	0			

LCS		Sample ID: <b>PLCSW1-080219</b>			Units: <b>µg/L</b>			Analysis Date: <b>02/19/08 20:51</b>		
Client ID:		Run ID: <b>ECD_1_080218E</b>			SeqNo: <b>1335921</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	0.1979	0.050	0.25	0	79.2	55-141	0			
gamma-Chlordane	0.1963	0.050	0.25	0	78.5	55-137	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

## QC BATCH REPORT

Batch ID: **28296** Instrument ID **ECD\_1** Method: **SW8081**

LCSD		Sample ID: <b>PLCSDW1-080219</b>		Units: <b>µg/L</b>		Analysis Date: <b>02/19/08 21:25</b>				
Client ID:		Run ID: <b>ECD_1_080218E</b>		SeqNo: <b>1335916</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	0.5056	0.10	0.5	0	101	53-144	0.4044	22.2	30	
4,4'-DDE	0.5071	0.10	0.5	0	101	55-144	0.3997	23.7	30	
4,4'-DDT	0.4779	0.10	0.5	0	95.6	53-149	0.3832	22	30	
Aldrin	0.239	0.050	0.25	0	95.6	47-141	0.1928	21.4	30	
alpha-BHC	0.25	0.050	0.25	0	100	51-141	0.2031	20.7	30	
beta-BHC	0.2452	0.050	0.25	0	98.1	58-144	0.1995	20.6	30	
delta-BHC	0.242	0.050	0.25	0	96.8	48-146	0.1974	20.3	30	
Dieldrin	0.5086	0.10	0.5	0	102	56-144	0.408	22	30	
Endosulfan I	0.2536	0.050	0.25	0	101	55-141	0.2034	22	30	
Endosulfan II	0.4995	0.10	0.5	0	99.9	57-144	0.4053	20.8	30	
Endosulfan sulfate	0.5106	0.10	0.5	0	102	58-145	0.4111	21.6	30	
Endrin	0.5844	0.10	0.5	0	117	60-163	0.4687	22	30	
Endrin aldehyde	0.5357	0.10	0.5	0	107	59-158	0.4371	20.3	30	
Endrin ketone	0.5316	0.10	0.5	0	106	59-154	0.4268	21.9	30	
gamma-BHC	0.2516	0.050	0.25	0	101	53-142	0.2047	20.5	30	
Heptachlor	0.255	0.050	0.25	0	102	51-144	0.2069	20.9	30	
Heptachlor epoxide	0.2442	0.050	0.25	0	97.7	55-142	0.1987	20.6	30	
Methoxychlor	2.592	0.50	2.5	0	104	59-150	2.113	20.4	30	
<i>Surr: Decachlorobiphenyl</i>	0.2138	0.10	0.2	0	107	61-154	0.1757	19.5	30	
<i>Surr: Tetrachloro-m-xylene</i>	0.2033	0.050	0.2	0	102	60-144	0.1654	20.5	30	

LCSD		Sample ID: <b>PLCSDW1-080219</b>		Units: <b>µg/L</b>		Analysis Date: <b>02/19/08 21:25</b>				
Client ID:		Run ID: <b>ECD_1_080218E</b>		SeqNo: <b>1335922</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	0.2437	0.050	0.25	0	97.5	55-141	0.1979	20.8	30	
gamma-Chlordane	0.2407	0.050	0.25	0	96.3	55-137	0.1963	20.4	30	

The following samples were analyzed in this batch:

0802327-01F

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

## QC BATCH REPORT

Batch ID: **28297** Instrument ID **ECD\_7** Method: **SW8082**

<b>MBLK</b>	Sample ID: <b>PBLKW2-080219</b>			Units: <b>µg/L</b>			Analysis Date: <b>02/19/08 13:38</b>			
Client ID:	Run ID: <b>ECD_7_080218D</b>			SeqNo: <b>1335937</b>			Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	U	0.50								
Aroclor 1221	U	0.50								
Aroclor 1232	U	0.50								
Aroclor 1242	U	0.50								
Aroclor 1248	U	0.50								
Aroclor 1254	U	0.50								
Aroclor 1260	U	0.50								
<i>Surr: Decachlorobiphenyl</i>	0.1974	0.050	0.2	0	98.7	54-140	0			
<i>Surr: Tetrachloro-m-xylene</i>	0.2036	0.050	0.2	0	102	53-137	0			

<b>LCS</b>	Sample ID: <b>PLCSW2-080219</b>			Units: <b>µg/L</b>			Analysis Date: <b>02/19/08 15:21</b>			
Client ID:	Run ID: <b>ECD_7_080218D</b>			SeqNo: <b>1335938</b>			Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	4.39	0.50	5	0	87.8	54-138	0			
Aroclor 1260	4.685	0.50	5	0	93.7	57-136	0			
<i>Surr: Decachlorobiphenyl</i>	0.1828	0.050	0.2	0	91.4	54-140	0			
<i>Surr: Tetrachloro-m-xylene</i>	0.1853	0.050	0.2	0	92.7	53-137	0			

<b>LCSD</b>	Sample ID: <b>PLCSDW2-080219</b>			Units: <b>µg/L</b>			Analysis Date: <b>02/19/08 15:55</b>			
Client ID:	Run ID: <b>ECD_7_080218D</b>			SeqNo: <b>1335939</b>			Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	4.882	0.50	5	0	97.6	54-138	4.39	10.6	20	
Aroclor 1260	5.407	0.50	5	0	108	57-136	4.685	14.3	20	
<i>Surr: Decachlorobiphenyl</i>	0.212	0.050	0.2	0	106	54-140	0.1828	14.8	20	
<i>Surr: Tetrachloro-m-xylene</i>	0.2085	0.050	0.2	0	104	53-137	0.1853	11.8	20	

The following samples were analyzed in this batch:

0802327-01H

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

## QC BATCH REPORT

Batch ID: **28298** Instrument ID **ECD\_5** Method: **SW8151**

<b>MBLK</b>	Sample ID: <b>HBLKW1-080219</b>			Units: <b>µg/L</b>			Analysis Date: <b>02/20/08 18:06</b>			
Client ID:	Run ID: <b>ECD_5_080220A</b>			SeqNo: <b>1335978</b>			Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	U	0.10								
2,4,5-TP (Silvex)	U	0.10								
2,4-D	U	0.20								
2,4-DB	U	0.20								
Dalapon	U	0.10								
Dicamba	U	0.10								
Dichlorprop	U	0.20								
Dinoseb	U	0.10								
MCPA	U	20								
MCPP	U	20								
Surr: DCAA	4.542	0.20	5	0	90.8	50-130	0			

<b>LCS</b>	Sample ID: <b>HLC SW1-080219</b>			Units: <b>µg/L</b>			Analysis Date: <b>02/20/08 18:43</b>			
Client ID:	Run ID: <b>ECD_5_080220A</b>			SeqNo: <b>1335979</b>			Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	2.463	0.10	2.5	0	98.5	44-122	0			
2,4,5-TP (Silvex)	2.451	0.10	2.5	0	98	49-126	0			
2,4-D	1.608	0.20	2.5	0	64.3	39-120	0			
2,4-DB	2.495	0.20	2.5	0	99.8	44-120	0			
Dalapon	1.072	0.10	2.5	0	42.9	40-120	0			P
Dicamba	2.491	0.10	2.5	0	99.6	60-120	0			
Dichlorprop	2.502	0.20	2.5	0	100	68-122	0			
Dinoseb	2.214	0.10	2.5	0	88.6	28-115	0			
MCPA	165.6	20	250	0	66.2	62-144	0			
MCPP	245.4	20	250	0	98.2	60-133	0			
Surr: DCAA	4.961	0.20	5	0	99.2	50-130	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

## QC BATCH REPORT

Batch ID: **28298** Instrument ID **ECD\_5** Method: **SW8151**

LCSD		Sample ID: <b>HLCSDW1-080219</b>				Units: <b>µg/L</b>		Analysis Date: <b>02/20/08 19:21</b>		
Client ID:		Run ID: <b>ECD_5_080220A</b>				SeqNo: <b>1335980</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	2.521	0.10	2.5	0	101	44-122	2.463	2.3	30	
2,4,5-TP (Silvex)	2.496	0.10	2.5	0	99.9	49-126	2.451	1.83	30	
2,4-D	1.712	0.20	2.5	0	68.5	39-120	1.608	6.22	30	
2,4-DB	2.561	0.20	2.5	0	102	44-120	2.495	2.58	30	
Dalapon	1.055	0.10	2.5	0	42.2	40-120	1.072	1.61	30	P
Dicamba	2.519	0.10	2.5	0	101	60-120	2.491	1.13	30	
Dichlorprop	2.582	0.20	2.5	0	103	68-122	2.502	3.12	30	
Dinoseb	2.243	0.10	2.5	0	89.7	28-115	2.214	1.27	30	
MCPA	167	20	250	0	66.8	62-144	165.6	0.852	30	
MCPP	253.5	20	250	0	101	60-133	245.4	3.26	30	
<i>Surr: DCAA</i>	<i>4.961</i>	<i>0.20</i>	<i>5</i>	<i>0</i>	<i>99.2</i>	<i>50-130</i>	<i>4.961</i>	<i>0.00322</i>	<i>30</i>	

The following samples were analyzed in this batch:

0802327-01G

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 6 of 24

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

# QC BATCH REPORT

Batch ID: **28300** Instrument ID **FID-8** Method: **SW8015M**

<b>MBLK</b>	Sample ID: <b>FBLKW1-080219</b>			Units: <b>mg/L</b>			Analysis Date: <b>02/22/08 16:39</b>			
Client ID:	Run ID: <b>FID-8_080219B</b>			SeqNo: <b>1336385</b>			Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	U	0.050								
<i>Surr: 2-Fluorobiphenyl</i>	<i>0.07635</i>	<i>0.0050</i>	<i>0.1</i>	<i>0</i>	<i>76.4</i>	<i>70-130</i>	<i>0</i>			

<b>LCS</b>	Sample ID: <b>FLCSW1-080219</b>			Units: <b>mg/L</b>			Analysis Date: <b>02/22/08 17:20</b>			
Client ID:	Run ID: <b>FID-8_080219B</b>			SeqNo: <b>1336386</b>			Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	0.9306	0.050	1	0	93.1	70-130	0			
<i>Surr: 2-Fluorobiphenyl</i>	<i>0.07913</i>	<i>0.0050</i>	<i>0.1</i>	<i>0</i>	<i>79.1</i>	<i>70-130</i>	<i>0</i>			

<b>LCSD</b>	Sample ID: <b>FLCSDW1-080219</b>			Units: <b>mg/L</b>			Analysis Date: <b>02/22/08 18:02</b>			
Client ID:	Run ID: <b>FID-8_080219B</b>			SeqNo: <b>1336387</b>			Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	1.081	0.050	1	0	108	70-130	0.9306	15	20	
<i>Surr: 2-Fluorobiphenyl</i>	<i>0.0815</i>	<i>0.0050</i>	<i>0.1</i>	<i>0</i>	<i>81.5</i>	<i>70-130</i>	<i>0.07913</i>	<i>2.95</i>	<i>20</i>	

The following samples were analyzed in this batch:

0802327-01D

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

## QC BATCH REPORT

Batch ID: **28318** Instrument ID **ICPMS02** Method: **SW6020**

MBLK	Sample ID: MBLKW1-022008				Units: mg/L			Analysis Date: 02/20/08 17:11		
Client ID:	Run ID: ICPMS02_080220A				SeqNo: 1331348		Prep Date: 2/20/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Arsenic	U	0.0050								
Barium	U	0.0050								
Cadmium	U	0.0020								
Chromium	U	0.0050								
Lead	U	0.0050								
Selenium	0.002029	0.0050								J
Silver	U	0.0050								

LCS	Sample ID: <b>MLCSW1-022008</b>					Units: <b>mg/L</b>		Analysis Date: <b>02/20/08 17:18</b>		
Client ID:	Run ID: <b>ICPMS02_080220A</b>				SeqNo: <b>1331349</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Arsenic	0.04726	0.0050	0.05	0	94.5	80-120	0			
Barium	0.04816	0.0050	0.05	0	96.3	80-120	0			
Cadmium	0.0484	0.0020	0.05	0	96.8	80-120	0			
Chromium	0.04592	0.0050	0.05	0	91.8	80-120	0			
Lead	0.04822	0.0050	0.05	0	96.4	80-120	0			
Selenium	0.04933	0.0050	0.05	0	98.7	80-120	0			
Silver	0.04971	0.0050	0.05	0	99.4	80-120	0			

MS	Sample ID: 0802300-10BMS					Units: mg/L		Analysis Date: 02/20/08 17:49		
Client ID:	Run ID: ICPMS02_080220A				SeqNo: 1331354		Prep Date: 2/20/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Arsenic	0.04762	0.0050	0.05	-0.0001468	95.5	80-120	0			
Barium	0.0492	0.0050	0.05	-0.0001461	98.7	80-120	0			
Cadmium	0.04955	0.0020	0.05	-0.0003917	99.9	80-120	0			
Chromium	0.04642	0.0050	0.05	-0.0001201	93.1	80-120	0			
Lead	0.04929	0.0050	0.05	-0.000277	99.1	80-120	0			
Selenium	0.04963	0.0050	0.05	0.001053	97.2	80-120	0			
Silver	0.04946	0.0050	0.05	-0.0003218	99.6	80-120	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

# QC BATCH REPORT

Batch ID: **28318** Instrument ID **ICPMS02** Method: **SW6020**

<b>MSD</b>		Sample ID: <b>0802300-10BMSD</b>				Units: <b>mg/L</b>		Analysis Date: <b>02/20/08 17:55</b>		
Client ID:		Run ID: <b>ICPMS02_080220A</b>				SeqNo: <b>1331355</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Arsenic	0.0491	0.0050	0.05	-0.0001468	98.5	80-120	0.04762	3.06	15	
Barium	0.04936	0.0050	0.05	-0.0001461	99	80-120	0.0492	0.325	15	
Cadmium	0.05057	0.0020	0.05	-0.0003917	102	80-120	0.04955	2.04	15	
Chromium	0.0475	0.0050	0.05	-0.0001201	95.2	80-120	0.04642	2.3	15	
Lead	0.04969	0.0050	0.05	-0.000277	99.9	80-120	0.04929	0.808	15	
Selenium	0.05087	0.0050	0.05	0.001053	99.6	80-120	0.04963	2.47	15	
Silver	0.05197	0.0050	0.05	-0.0003218	105	80-120	0.04946	4.95	15	

<b>DUP</b>		Sample ID: <b>0802300-10BDUP</b>				Units: <b>mg/L</b>		Analysis Date: <b>02/20/08 17:37</b>		
Client ID:		Run ID: <b>ICPMS02_080220A</b>				SeqNo: <b>1331352</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Arsenic	U	0.0050	0	0	0	0-0	-0.0001468	0	25	
Barium	U	0.0050	0	0	0	0-0	-0.0001461	0	25	
Cadmium	U	0.0020	0	0	0	0-0	-0.0003917	0	25	
Chromium	U	0.0050	0	0	0	0-0	-0.0001201	0	25	
Lead	U	0.0050	0	0	0	0-0	-0.000277	0	25	
Selenium	0.001784	0.0050	0	0	0	0-0	0.001053	0	25	J
Silver	U	0.0050	0	0	0	0-0	-0.0003218	0	25	

The following samples were analyzed in this batch:

0802327-01C

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

## QC BATCH REPORT

Batch ID: **28346** Instrument ID **Mercury** Method: **SW7470**

**MBLK** Sample ID: **GBLKW1-022208** Units: **mg/L** Analysis Date: **02/22/08 13:55**

Client ID: Run ID: **MERCURY\_080222B** SeqNo: **1332759** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	U	0.00020								

**LCS** Sample ID: **GLCSW1-022208** Units: **mg/L** Analysis Date: **02/22/08 13:57**

Client ID: Run ID: **MERCURY\_080222B** SeqNo: **1332762** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	0.00502	0.00020	0.005	0	100	85-115	0			

**LCSD** Sample ID: **GLCSDW1-022208** Units: **mg/L** Analysis Date: **02/22/08 13:59**

Client ID: Run ID: **MERCURY\_080222B** SeqNo: **1332765** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	0.00506	0.00020	0.005	0	101	85-115	0.00502	0.794	20	

**MS** Sample ID: **0802381-01BMS** Units: **mg/L** Analysis Date: **02/22/08 14:07**

Client ID: Run ID: **MERCURY\_080222B** SeqNo: **1332774** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	0.00529	0.00020	0.005	0.000011	106	85-115	0			

**MSD** Sample ID: **0802381-01BMSD** Units: **mg/L** Analysis Date: **02/22/08 14:09**

Client ID: Run ID: **MERCURY\_080222B** SeqNo: **1332776** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	0.0052	0.00020	0.005	0.000011	104	85-115	0.00529	1.72	20	

**DUP** Sample ID: **0802381-01BDUP** Units: **mg/L** Analysis Date: **02/22/08 14:05**

Client ID: Run ID: **MERCURY\_080222B** SeqNo: **1332771** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	U	0.00020	0	0	0	0-0	0.000011	0	20	

The following samples were analyzed in this batch:

0802327-01C

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

## QC BATCH REPORT

Batch ID: **28299** Instrument ID **SV-2** Method: **SW8270**

**MBLK** Sample ID: **SBLKW1-080219** Units: **µg/L** Analysis Date: **02/20/08 15:27**

Client ID: Run ID: **SV-2\_080220B** SeqNo: **1334714** Prep Date: **2/19/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	U	0.20								
2,4,5-Trichlorophenol	U	0.20								
2,4,6-Trichlorophenol	U	0.20								
2,4-Dichlorophenol	U	0.20								
2,4-Dimethylphenol	U	0.20								
2,4-Dinitrophenol	U	1.0								
2,4-Dinitrotoluene	U	0.20								
2,6-Dinitrotoluene	U	0.20								
2-Chloronaphthalene	U	0.20								
2-Chlorophenol	U	0.20								
2-Methylnaphthalene	U	0.20								
2-Methylphenol	U	0.20								
2-Nitroaniline	U	0.20								
2-Nitrophenol	U	0.20								
3&4-Methylphenol	U	0.20								
3,3'-Dichlorobenzidine	U	0.20								
3-Nitroaniline	U	0.20								
4,6-Dinitro-2-methylphenol	U	0.20								
4-Bromophenyl phenyl ether	U	0.20								
4-Chloro-3-methylphenol	U	0.20								
4-Chloroaniline	U	0.20								
4-Chlorophenyl phenyl ether	U	0.20								
4-Nitroaniline	U	0.20								
4-Nitrophenol	U	1.0								
Acenaphthene	U	0.20								
Acenaphthylene	U	0.20								
Acetophenone	U	0.20								
Anthracene	U	0.20								
Atrazine	U	0.20								
Benz(a)anthracene	U	0.20								
Benzaldehyde	U	0.20								
Benzo(a)pyrene	U	0.20								
Benzo(b)fluoranthene	U	0.20								
Benzo(g,h,i)perylene	U	0.20								
Benzo(k)fluoranthene	U	0.20								
Bis(2-chloroethoxy)methane	U	0.20								
Bis(2-chloroethyl)ether	U	0.20								
Bis(2-chloroisopropyl)ether	U	0.20								
Bis(2-ethylhexyl)phthalate	U	0.20								
Butyl benzyl phthalate	U	0.20								

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 11 of 24

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

## QC BATCH REPORT

Batch ID: <b>28299</b>		Instrument ID <b>SV-2</b>		Method: <b>SW8270</b>				
Caprolactam	U	0.20						
Carbazole	U	0.20						
Chrysene	U	0.20						
Di-n-butyl phthalate	U	0.20						
Di-n-octyl phthalate	U	0.20						
Dibenz(a,h)anthracene	U	0.20						
Dibenzofuran	U	0.20						
Diethyl phthalate	U	0.20						
Dimethyl phthalate	U	0.20						
Fluoranthene	U	0.20						
Fluorene	U	0.20						
Hexachlorobenzene	U	0.20						
Hexachlorobutadiene	U	0.20						
Hexachlorocyclopentadiene	U	0.20						
Hexachloroethane	U	0.20						
Indeno(1,2,3-cd)pyrene	U	0.20						
Isophorone	U	0.20						
N-Nitrosodi-n-propylamine	U	0.20						
N-Nitrosodiphenylamine	U	0.20						
Naphthalene	U	0.20						
Nitrobenzene	U	0.20						
Pentachlorophenol	U	0.20						
Phenanthrene	U	0.20						
Phenol	U	0.20						
Pyrene	U	0.20						
<i>Surr: 2,4,6-Tribromophenol</i>	3.128	0.20	5	0	62.6	34-129	0	
<i>Surr: 2-Fluorobiphenyl</i>	3.809	0.20	5	0	76.2	48-115	0	
<i>Surr: 2-Fluorophenol</i>	3.656	0.20	5	0	73.1	32-115	0	
<i>Surr: 4-Terphenyl-d14</i>	3.656	0.20	5	0	73.1	47-117	0	
<i>Surr: Nitrobenzene-d5</i>	3.401	0.20	5	0	68	44-115	0	
<i>Surr: Phenol-d6</i>	3.707	0.20	5	0	74.1	21-119	0	

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R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 12 of 24

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

## QC BATCH REPORT

Batch ID: **28299** Instrument ID **SV-2** Method: **SW8270**

LCS		Sample ID: <b>SLCSW1-080219</b>				Units: <b>µg/L</b>		Analysis Date: <b>02/20/08 15:49</b>		
Client ID:		Run ID: <b>SV-2_080220B</b>				SeqNo: <b>1334715</b>		Prep Date: <b>2/19/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	4.074	0.20	5	0	81.5	40-140	0			
2,4,5-Trichlorophenol	4.386	0.20	5	0	87.7	30-130	0			
2,4,6-Trichlorophenol	4.347	0.20	5	0	86.9	30-130	0			
2,4-Dichlorophenol	4.144	0.20	5	0	82.9	30-130	0			
2,4-Dimethylphenol	4.417	0.20	5	0	88.3	50-115	0			
2,4-Dinitrophenol	3.47	1.0	5	0	69.4	30-130	0			
2,4-Dinitrotoluene	4.396	0.20	5	0	87.9	48-125	0			
2,6-Dinitrotoluene	4.256	0.20	5	0	85.1	44-128	0			
2-Chloronaphthalene	4.779	0.20	5	0	95.6	40-140	0			
2-Chlorophenol	4.21	0.20	5	0	84.2	30-130	0			
2-Methylnaphthalene	4.194	0.20	5	0	83.9	50-115	0			
2-Methylphenol	4.03	0.20	5	0	80.6	41-115	0			
2-Nitroaniline	4.245	0.20	5	0	84.9	30-130	0			
2-Nitrophenol	3.972	0.20	5	0	79.4	30-130	0			
3&4-Methylphenol	4.277	0.20	5	0	85.5	27-115	0			
3,3'-Dichlorobenzidine	3.168	0.20	5	0	63.4	30-130	0			
3-Nitroaniline	3.702	0.20	5	0	74	30-130	0			
4,6-Dinitro-2-methylphenol	3.543	0.20	5	0	70.9	30-130	0			
4-Bromophenyl phenyl ether	4.168	0.20	5	0	83.4	50-116	0			
4-Chloro-3-methylphenol	4.309	0.20	5	0	86.2	30-130	0			
4-Chloroaniline	2.951	0.20	5	0	59	30-130	0			
4-Chlorophenyl phenyl ether	4.536	0.20	5	0	90.7	52-116	0			
4-Nitroaniline	4.292	0.20	5	0	85.8	30-130	0			
4-Nitrophenol	4.051	1.0	5	0	81	30-130	0			
Acenaphthene	4.211	0.20	5	0	84.2	51-115	0			
Acenaphthylene	4.321	0.20	5	0	86.4	50-115	0			
Acetophenone	4.008	0.20	5	0	80.2	40-140	0			
Anthracene	4.228	0.20	5	0	84.6	51-119	0			
Atrazine	4.05	0.20	5	0	81	40-140	0			
Benz(a)anthracene	4.295	0.20	5	0	85.9	48-122	0			
Benzaldehyde	3.71	0.20	5	0	74.2	30-130	0			
Benzo(a)pyrene	4.32	0.20	5	0	86.4	46-121	0			
Benzo(b)fluoranthene	4.453	0.20	5	0	89.1	39-126	0			
Benzo(g,h,i)perylene	4.147	0.20	5	0	82.9	42-127	0			
Benzo(k)fluoranthene	4.68	0.20	5	0	93.6	40-127	0			
Bis(2-chloroethoxy)methane	4.119	0.20	5	0	82.4	40-130	0			
Bis(2-chloroethyl)ether	3.963	0.20	5	0	79.3	40-130	0			
Bis(2-chloroisopropyl)ether	3.933	0.20	5	0	78.7	40-130	0			
Bis(2-ethylhexyl)phthalate	4.252	0.20	5	0	85	37-132	0			
Butyl benzyl phthalate	4.182	0.20	5	0	83.6	40-130	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 13 of 24

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

## QC BATCH REPORT

Batch ID: <b>28299</b>		Instrument ID <b>SV-2</b>		Method: <b>SW8270</b>				
Caprolactam	3.924	0.20	5	0	78.5	30-130	0	
Carbazole	4.444	0.20	5	0	88.9	40-128	0	
Chrysene	4.23	0.20	5	0	84.6	49-121	0	
Di-n-butyl phthalate	4.245	0.20	5	0	84.9	40-140	0	
Di-n-octyl phthalate	4.215	0.20	5	0	84.3	40-140	0	
Dibenz(a,h)anthracene	4.238	0.20	5	0	84.8	41-128	0	
Dibenzofuran	4.295	0.20	5	0	85.9	53-115	0	
Diethyl phthalate	4.316	0.20	5	0	86.3	40-140	0	
Dimethyl phthalate	4.141	0.20	5	0	82.8	40-140	0	
Fluoranthene	4.259	0.20	5	0	85.2	52-120	0	
Fluorene	4.177	0.20	5	0	83.5	52-115	0	
Hexachlorobenzene	4.165	0.20	5	0	83.3	49-115	0	
Hexachlorobutadiene	4.112	0.20	5	0	82.2	40-140	0	
Hexachlorocyclopentadiene	4.252	0.20	5	0	85	40-140	0	
Hexachloroethane	3.921	0.20	5	0	78.4	40-115	0	
Indeno(1,2,3-cd)pyrene	4.247	0.20	5	0	84.9	37-134	0	
Isophorone	3.992	0.20	5	0	79.8	40-140	0	
N-Nitrosodi-n-propylamine	3.976	0.20	5	0	79.5	40-140	0	
N-Nitrosodiphenylamine	4.424	0.20	5	0	88.5	40-140	0	
Naphthalene	4.126	0.20	5	0	82.5	51-115	0	
Nitrobenzene	4.035	0.20	5	0	80.7	57-115	0	
Pentachlorophenol	4.231	0.20	5	0	84.6	19-138	0	
Phenanthrene	4.293	0.20	5	0	85.9	53-115	0	
Phenol	4.152	0.20	5	0	83	10-110	0	
Pyrene	4.38	0.20	5	0	87.6	49-117	0	
<i>Surr: 2,4,6-Tribromophenol</i>	3.655	0.20	5	0	73.1	34-129	0	
<i>Surr: 2-Fluorobiphenyl</i>	4.106	0.20	5	0	82.1	48-115	0	
<i>Surr: 2-Fluorophenol</i>	4.112	0.20	5	0	82.2	32-115	0	
<i>Surr: 4-Terphenyl-d14</i>	4.009	0.20	5	0	80.2	47-117	0	
<i>Surr: Nitrobenzene-d5</i>	3.66	0.20	5	0	73.2	44-115	0	
<i>Surr: Phenol-d6</i>	3.882	0.20	5	0	77.6	21-119	0	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

# QC BATCH REPORT

Batch ID: **28299** Instrument ID **SV-2** Method: **SW8270**

LCSD		Sample ID: <b>SLCSDW1-080219</b>				Units: <b>µg/L</b>		Analysis Date: <b>02/20/08 16:12</b>		
Client ID:		Run ID: <b>SV-2_080220B</b>				SeqNo: <b>1334716</b>		Prep Date: <b>2/19/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	4.101	0.20	5	0	82	40-140	4.074	0.644	20	
2,4,5-Trichlorophenol	4.424	0.20	5	0	88.5	30-130	4.386	0.866	20	
2,4,6-Trichlorophenol	4.27	0.20	5	0	85.4	30-130	4.347	1.81	20	
2,4-Dichlorophenol	4.203	0.20	5	0	84.1	30-130	4.144	1.42	20	
2,4-Dimethylphenol	4.47	0.20	5	0	89.4	50-115	4.417	1.2	20	
2,4-Dinitrophenol	3.597	1.0	5	0	71.9	30-130	3.47	3.61	20	
2,4-Dinitrotoluene	4.176	0.20	5	0	83.5	48-125	4.396	5.13	20	
2,6-Dinitrotoluene	3.985	0.20	5	0	79.7	44-128	4.256	6.59	20	
2-Chloronaphthalene	4.344	0.20	5	0	86.9	40-140	4.779	9.52	20	
2-Chlorophenol	4.378	0.20	5	0	87.6	30-130	4.21	3.9	20	
2-Methylnaphthalene	3.999	0.20	5	0	80	50-115	4.194	4.76	20	
2-Methylphenol	4.313	0.20	5	0	86.3	41-115	4.03	6.78	20	
2-Nitroaniline	3.915	0.20	5	0	78.3	30-130	4.245	8.09	20	
2-Nitrophenol	3.77	0.20	5	0	75.4	30-130	3.972	5.22	20	
3&4-Methylphenol	4.349	0.20	5	0	87	27-115	4.277	1.67	20	
3,3'-Dichlorobenzidine	3.137	0.20	5	0	62.7	30-130	3.168	0.998	20	
3-Nitroaniline	3.788	0.20	5	0	75.8	30-130	3.702	2.28	20	
4,6-Dinitro-2-methylphenol	3.693	0.20	5	0	73.9	30-130	3.543	4.14	20	
4-Bromophenyl phenyl ether	3.879	0.20	5	0	77.6	50-116	4.168	7.17	20	
4-Chloro-3-methylphenol	4.2	0.20	5	0	84	30-130	4.309	2.58	20	
4-Chloroaniline	2.81	0.20	5	0	56.2	30-130	2.951	4.91	20	
4-Chlorophenyl phenyl ether	4.075	0.20	5	0	81.5	52-116	4.536	10.7	20	
4-Nitroaniline	4.308	0.20	5	0	86.2	30-130	4.292	0.359	20	
4-Nitrophenol	3.74	1.0	5	0	74.8	30-130	4.051	8.01	20	
Acenaphthene	4.105	0.20	5	0	82.1	51-115	4.211	2.57	20	
Acenaphthylene	4.112	0.20	5	0	82.2	50-115	4.321	4.96	20	
Acetophenone	3.812	0.20	5	0	76.2	40-140	4.008	5.01	20	
Anthracene	3.949	0.20	5	0	79	51-119	4.228	6.82	20	
Atrazine	4.162	0.20	5	0	83.2	40-140	4.05	2.72	20	
Benz(a)anthracene	4.365	0.20	5	0	87.3	48-122	4.295	1.63	20	
Benzaldehyde	3.461	0.20	5	0	69.2	30-130	3.71	6.93	20	
Benzo(a)pyrene	4.499	0.20	5	0	90	46-121	4.32	4.06	20	
Benzo(b)fluoranthene	4.536	0.20	5	0	90.7	39-126	4.453	1.84	20	
Benzo(g,h,i)perylene	4.476	0.20	5	0	89.5	42-127	4.147	7.63	20	
Benzo(k)fluoranthene	4.78	0.20	5	0	95.6	40-127	4.68	2.13	20	
Bis(2-chloroethoxy)methane	4.025	0.20	5	0	80.5	40-130	4.119	2.31	20	
Bis(2-chloroethyl)ether	3.968	0.20	5	0	79.4	40-130	3.963	0.13	20	
Bis(2-chloroisopropyl)ether	3.868	0.20	5	0	77.4	40-130	3.933	1.68	20	
Bis(2-ethylhexyl)phthalate	4.353	0.20	5	0	87.1	37-132	4.252	2.33	20	
Butyl benzyl phthalate	4.099	0.20	5	0	82	40-130	4.182	2.01	20	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

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R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

## QC BATCH REPORT

Batch ID: <b>28299</b>		Instrument ID <b>SV-2</b>		Method: <b>SW8270</b>					
Caprolactam	4.207	0.20	5	0	84.1	30-130	3.924	6.95	20
Carbazole	4.199	0.20	5	0	84	40-128	4.444	5.67	20
Chrysene	4.223	0.20	5	0	84.5	49-121	4.23	0.154	20
Di-n-butyl phthalate	4.04	0.20	5	0	80.8	40-140	4.245	4.94	20
Di-n-octyl phthalate	4.205	0.20	5	0	84.1	40-140	4.215	0.249	20
Dibenz(a,h)anthracene	4.217	0.20	5	0	84.3	41-128	4.238	0.51	20
Dibenzofuran	4.143	0.20	5	0	82.9	53-115	4.295	3.61	20
Diethyl phthalate	4.216	0.20	5	0	84.3	40-140	4.316	2.36	20
Dimethyl phthalate	4.05	0.20	5	0	81	40-140	4.141	2.21	20
Fluoranthene	4.006	0.20	5	0	80.1	52-120	4.259	6.13	20
Fluorene	4.122	0.20	5	0	82.4	52-115	4.177	1.32	20
Hexachlorobenzene	4.082	0.20	5	0	81.6	49-115	4.165	2	20
Hexachlorobutadiene	4.195	0.20	5	0	83.9	40-140	4.112	2	20
Hexachlorocyclopentadiene	4.01	0.20	5	0	80.2	40-140	4.252	5.86	20
Hexachloroethane	3.975	0.20	5	0	79.5	40-115	3.921	1.35	20
Indeno(1,2,3-cd)pyrene	4.086	0.20	5	0	81.7	37-134	4.247	3.85	20
Isophorone	3.831	0.20	5	0	76.6	40-140	3.992	4.11	20
N-Nitrosodi-n-propylamine	4.241	0.20	5	0	84.8	40-140	3.976	6.46	20
N-Nitrosodiphenylamine	4.122	0.20	5	0	82.4	40-140	4.424	7.06	20
Naphthalene	3.961	0.20	5	0	79.2	51-115	4.126	4.08	20
Nitrobenzene	3.776	0.20	5	0	75.5	57-115	4.035	6.63	20
Pentachlorophenol	3.902	0.20	5	0	78	19-138	4.231	8.1	20
Phenanthrene	4.175	0.20	5	0	83.5	53-115	4.293	2.79	20
Phenol	4.217	0.20	5	0	84.3	10-110	4.152	1.55	20
Pyrene	4.307	0.20	5	0	86.1	49-117	4.38	1.68	20
<i>Surr: 2,4,6-Tribromophenol</i>	<i>3.504</i>	<i>0.20</i>	<i>5</i>	<i>0</i>	<i>70.1</i>	<i>34-129</i>	<i>3.655</i>	<i>4.2</i>	<i>20</i>
<i>Surr: 2-Fluorobiphenyl</i>	<i>3.875</i>	<i>0.20</i>	<i>5</i>	<i>0</i>	<i>77.5</i>	<i>48-115</i>	<i>4.106</i>	<i>5.8</i>	<i>20</i>
<i>Surr: 2-Fluorophenol</i>	<i>4.113</i>	<i>0.20</i>	<i>5</i>	<i>0</i>	<i>82.3</i>	<i>32-115</i>	<i>4.112</i>	<i>0.0415</i>	<i>20</i>
<i>Surr: 4-Terphenyl-d14</i>	<i>3.779</i>	<i>0.20</i>	<i>5</i>	<i>0</i>	<i>75.6</i>	<i>47-117</i>	<i>4.009</i>	<i>5.9</i>	<i>20</i>
<i>Surr: Nitrobenzene-d5</i>	<i>3.702</i>	<i>0.20</i>	<i>5</i>	<i>0</i>	<i>74</i>	<i>44-115</i>	<i>3.66</i>	<i>1.16</i>	<i>20</i>
<i>Surr: Phenol-d6</i>	<i>3.867</i>	<i>0.20</i>	<i>5</i>	<i>0</i>	<i>77.3</i>	<i>21-119</i>	<i>3.882</i>	<i>0.4</i>	<i>20</i>

The following samples were analyzed in this batch:

0802327-01E

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

## QC BATCH REPORT

Batch ID: **R60091** Instrument ID **VOA2** Method: **SW8260**

**MBLK** Sample ID: **VBLKW-021908** Units: **µg/L** Analysis Date: **02/19/08 16:57**

Client ID: Run ID: **VOA2\_080219A** SeqNo: **1330902** Prep Date: DF: 1

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	U	5.0								
1,1,2,2-Tetrachloroethane	U	5.0								
1,1,2-Trichlor-1,2,2-trifluoroethane	U	5.0								
1,1,2-Trichloroethane	U	5.0								
1,1-Dichloroethane	U	5.0								
1,1-Dichloroethene	U	5.0								
1,2,4-Trichlorobenzene	U	5.0								
1,2-Dibromo-3-chloropropane	U	5.0								
1,2-Dibromoethane	U	5.0								
1,2-Dichlorobenzene	U	5.0								
1,2-Dichloroethane	U	5.0								
1,2-Dichloropropane	U	5.0								
1,3-Dichlorobenzene	U	5.0								
1,4-Dichlorobenzene	U	5.0								
2-Butanone	U	10								
2-Hexanone	U	10								
4-Methyl-2-pentanone	U	10								
Acetone	U	10								
Benzene	U	5.0								
Bromodichloromethane	U	5.0								
Bromoform	U	5.0								
Bromomethane	U	5.0								
Carbon disulfide	U	10								
Carbon tetrachloride	U	5.0								
Chlorobenzene	U	5.0								
Chloroethane	U	5.0								
Chloroform	U	5.0								
Chloromethane	U	5.0								
cis-1,2-Dichloroethene	U	5.0								
cis-1,3-Dichloropropene	U	5.0								
Cyclohexane	U	5.0								
Dibromochloromethane	U	5.0								
Dichlorodifluoromethane	U	5.0								
Ethylbenzene	U	5.0								
Isopropylbenzene	U	5.0								
Methyl acetate	U	5.0								
Methyl tert-butyl ether	U	5.0								
Methylcyclohexane	U	5.0								
Styrene	U	5.0								
Tetrachloroethene	U	5.0								

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E - Value above quantitation range

QC Page: 17 of 24

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

## QC BATCH REPORT

Batch ID: <b>R60091</b>		Instrument ID <b>VOA2</b>		Method: <b>SW8260</b>				
Toluene	U	5.0						
trans-1,2-Dichloroethene	U	5.0						
trans-1,3-Dichloropropene	U	5.0						
Trichloroethene	U	5.0						
Trichlorofluoromethane	U	5.0						
Vinyl chloride	U	2.0						
Xylenes, Total	U	15						
<i>Surr: 1,2-Dichloroethane-d4</i>	<i>44.17</i>	<i>5.0</i>	<i>50</i>	<i>0</i>	<i>88.3</i>	<i>70-125</i>	<i>0</i>	
<i>Surr: 4-Bromofluorobenzene</i>	<i>43.65</i>	<i>5.0</i>	<i>50</i>	<i>0</i>	<i>87.3</i>	<i>72-125</i>	<i>0</i>	
<i>Surr: Dibromofluoromethane</i>	<i>43.27</i>	<i>5.0</i>	<i>50</i>	<i>0</i>	<i>86.5</i>	<i>71-125</i>	<i>0</i>	
<i>Surr: Toluene-d8</i>	<i>46.04</i>	<i>5.0</i>	<i>50</i>	<i>0</i>	<i>92.1</i>	<i>75-125</i>	<i>0</i>	

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QC Page: 18 of 24



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

# QC BATCH REPORT

Batch ID: **R60091** Instrument ID **VOA2** Method: **SW8260**

LCS		Sample ID: <b>VLCSW-021908</b>				Units: <b>µg/L</b>		Analysis Date: <b>02/19/08 16:09</b>		
Client ID:		Run ID: <b>VOA2_080219A</b>				SeqNo: <b>1330901</b>		Prep Date:		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	49.52	5.0	50	0	99	80-120	0			
1,1,2,2-Tetrachloroethane	49.69	5.0	50	0	99.4	72-120	0			
1,1,2-Trichlor-1,2,2-trifluoroethane	44.12	5.0	50	0	88.2	73-123	0			
1,1,2-Trichloroethane	47.63	5.0	50	0	95.3	80-120	0			
1,1-Dichloroethane	47.27	5.0	50	0	94.5	76-120	0			
1,1-Dichloroethene	46.27	5.0	50	0	92.5	73-124	0			
1,2,4-Trichlorobenzene	49.09	5.0	50	0	98.2	80-120	0			
1,2-Dibromo-3-chloropropane	54.93	5.0	50	0	110	65-125	0			
1,2-Dibromoethane	49.6	5.0	50	0	99.2	80-120	0			
1,2-Dichlorobenzene	48.68	5.0	50	0	97.4	80-120	0			
1,2-Dichloroethane	49.42	5.0	50	0	98.8	78-120	0			
1,2-Dichloropropane	48.13	5.0	50	0	96.3	80-120	0			
1,3-Dichlorobenzene	47.16	5.0	50	0	94.3	80-120	0			
1,4-Dichlorobenzene	46.49	5.0	50	0	93	80-120	0			
2-Butanone	105.1	10	100	0	105	58-132	0			
2-Hexanone	106	10	100	0	106	61-130	0			
4-Methyl-2-pentanone	103.1	10	100	0	103	65-127	0			
Acetone	95.86	10	100	0	95.9	59-137	0			
Benzene	47.5	5.0	50	0	95	73-121	0			
Bromodichloromethane	50.47	5.0	50	0	101	80-120	0			
Bromoform	49.4	5.0	50	0	98.8	79-120	0			
Bromomethane	50.09	5.0	50	0	100	66-137	0			
Carbon disulfide	95.71	10	100	0	95.7	68-141	0			
Carbon tetrachloride	43.31	5.0	50	0	86.6	75-124	0			
Chlorobenzene	47.36	5.0	50	0	94.7	80-120	0			
Chloroethane	47.84	5.0	50	0	95.7	76-121	0			
Chloroform	49.33	5.0	50	0	98.7	80-120	0			
Chloromethane	51.6	5.0	50	0	103	67-123	0			
cis-1,2-Dichloroethene	48.34	5.0	50	0	96.7	78-120	0			
cis-1,3-Dichloropropene	52.86	5.0	50	0	106	80-120	0			
Cyclohexane	42.07	5.0	50	0	84.1	66-125	0			
Dibromochloromethane	52.27	5.0	50	0	105	80-120	0			
Dichlorodifluoromethane	46.76	5.0	50	0	93.5	63-125	0			
Ethylbenzene	48.04	5.0	50	0	96.1	80-120	0			
Isopropylbenzene	48.19	5.0	50	0	96.4	80-120	0			
Methyl acetate	48.59	5.0	50	0	97.2	60-130	0			
Methyl tert-butyl ether	51.46	5.0	50	0	103	73-121	0			
Methylcyclohexane	42.02	5.0	50	0	84	75-122	0			
Styrene	49.08	5.0	50	0	98.2	80-120	0			
Tetrachloroethene	45.52	5.0	50	0	91	79-120	0			

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E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

## QC BATCH REPORT

Batch ID: <b>R60091</b>		Instrument ID <b>VOA2</b>		Method: <b>SW8260</b>			
Toluene	48.67	5.0	50	0	97.3	80-120	0
trans-1,2-Dichloroethene	47.81	5.0	50	0	95.6	78-120	0
trans-1,3-Dichloropropene	52.02	5.0	50	0	104	80-120	0
Trichloroethene	48.48	5.0	50	0	97	80-120	0
Trichlorofluoromethane	46.05	5.0	50	0	92.1	72-130	0
Vinyl chloride	47.99	2.0	50	0	96	70-127	0
Xylenes, Total	143.6	15	150	0	95.7	80-120	0
<i>Surr: 1,2-Dichloroethane-d4</i>	<i>42</i>	<i>5.0</i>	<i>50</i>	<i>0</i>	<i>84</i>	<i>70-125</i>	<i>0</i>
<i>Surr: 4-Bromofluorobenzene</i>	<i>43.72</i>	<i>5.0</i>	<i>50</i>	<i>0</i>	<i>87.4</i>	<i>72-125</i>	<i>0</i>
<i>Surr: Dibromofluoromethane</i>	<i>44.11</i>	<i>5.0</i>	<i>50</i>	<i>0</i>	<i>88.2</i>	<i>71-125</i>	<i>0</i>
<i>Surr: Toluene-d8</i>	<i>44.95</i>	<i>5.0</i>	<i>50</i>	<i>0</i>	<i>89.9</i>	<i>75-125</i>	<i>0</i>

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E - Value above quantitation range

QC Page: 20 of 24

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

# QC BATCH REPORT

Batch ID: **R60091** Instrument ID **VOA2** Method: **SW8260**

MS		Sample ID: <b>0802352-01AMS</b>				Units: <b>µg/L</b>		Analysis Date: <b>02/19/08 18:34</b>		
Client ID:		Run ID: <b>VOA2_080219A</b>				SeqNo: <b>1330905</b>		Prep Date:		DF: <b>5</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	227.5	25	250	0	91	80-120	0			
1,1,2,2-Tetrachloroethane	257.7	25	250	0	103	72-120	0			
1,1,2-Trichlor-1,2,2-trifluoroethane	210.9	25	250	0	84.4	73-123	0			
1,1,2-Trichloroethane	243.9	25	250	0	97.6	80-120	0			
1,1-Dichloroethane	233.6	25	250	0	93.4	76-120	0			
1,1-Dichloroethene	222.3	25	250	0	88.9	73-124	0			
1,2,4-Trichlorobenzene	233.4	25	250	0	93.4	80-120	0			
1,2-Dibromo-3-chloropropane	247.2	25	250	0	98.9	65-125	0			
1,2-Dibromoethane	256.6	25	250	0	103	80-120	0			
1,2-Dichlorobenzene	235.5	25	250	0	94.2	80-120	0			
1,2-Dichloroethane	445.8	25	250	208.8	94.8	78-120	0			
1,2-Dichloropropane	243.5	25	250	0	97.4	80-120	0			
1,3-Dichlorobenzene	231.4	25	250	0	92.6	80-120	0			
1,4-Dichlorobenzene	223.8	25	250	0	89.5	80-120	0			
2-Butanone	512.4	50	500	0	102	58-132	0			
2-Hexanone	521.4	50	500	0	104	61-130	0			
4-Methyl-2-pentanone	544	50	500	0	109	65-127	0			
Acetone	467.3	50	500	0	93.5	59-137	0			
Benzene	240.7	25	250	1.727	95.6	73-121	0			
Bromodichloromethane	248.5	25	250	0	99.4	80-120	0			
Bromoform	251.2	25	250	0	100	79-120	0			
Bromomethane	247.5	25	250	0	99	66-137	0			
Carbon disulfide	456.3	50	500	0	91.3	68-141	0			
Carbon tetrachloride	196.5	25	250	0	78.6	75-124	0			
Chlorobenzene	235.4	25	250	0	94.2	80-120	0			
Chloroethane	243.2	25	250	0	97.3	76-121	0			
Chloroform	234.5	25	250	0	93.8	80-120	0			
Chloromethane	266.6	25	250	0	107	67-123	0			
cis-1,2-Dichloroethene	244.1	25	250	0	97.6	78-120	0			
cis-1,3-Dichloropropene	254.7	25	250	0	102	80-120	0			
Cyclohexane	211.1	25	250	0	84.4	66-125	0			
Dibromochloromethane	253.5	25	250	0	101	80-120	0			
Dichlorodifluoromethane	221.7	25	250	0	88.7	63-125	0			
Ethylbenzene	230.4	25	250	0	92.1	80-120	0			
Isopropylbenzene	231	25	250	0	92.4	80-120	0			
Methyl acetate	260.6	25	250	0	104	60-130	0			
Methyl tert-butyl ether	287.5	25	250	33.46	102	73-121	0			
Methylcyclohexane	214.5	25	250	0	85.8	75-122	0			
Styrene	235.9	25	250	0	94.3	80-120	0			
Tetrachloroethene	211.8	25	250	0	84.7	79-120	0			

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R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 21 of 24

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

## QC BATCH REPORT

Batch ID: <b>R60091</b>		Instrument ID <b>VOA2</b>		Method: <b>SW8260</b>				
Toluene	236.4	25	250	0	94.6	80-120	0	
trans-1,2-Dichloroethene	233.3	25	250	0	93.3	78-120	0	
trans-1,3-Dichloropropene	252.8	25	250	0	101	80-120	0	
Trichloroethene	230.8	25	250	0	92.3	80-120	0	
Trichlorofluoromethane	216.3	25	250	0	86.5	72-130	0	
Vinyl chloride	230	10	250	0	92	70-127	0	
Xylenes, Total	697.4	75	750	0	93	80-120	0	
<i>Surr: 1,2-Dichloroethane-d4</i>	<i>205</i>	<i>25</i>	<i>250</i>	<i>0</i>	<i>82</i>	<i>70-125</i>	<i>0</i>	
<i>Surr: 4-Bromofluorobenzene</i>	<i>214.8</i>	<i>25</i>	<i>250</i>	<i>0</i>	<i>85.9</i>	<i>72-125</i>	<i>0</i>	
<i>Surr: Dibromofluoromethane</i>	<i>213.3</i>	<i>25</i>	<i>250</i>	<i>0</i>	<i>85.3</i>	<i>71-125</i>	<i>0</i>	
<i>Surr: Toluene-d8</i>	<i>225.9</i>	<i>25</i>	<i>250</i>	<i>0</i>	<i>90.3</i>	<i>75-125</i>	<i>0</i>	

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E - Value above quantitation range

QC Page: 22 of 24

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

# QC BATCH REPORT

Batch ID: **R60091** Instrument ID **VOA2** Method: **SW8260**

MSD		Sample ID: <b>0802352-01AMSD</b>				Units: <b>µg/L</b>		Analysis Date: <b>02/19/08 18:59</b>		
Client ID:		Run ID: <b>VOA2_080219A</b>				SeqNo: <b>1330906</b>		Prep Date:		DF: <b>5</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	228.4	25	250	0	91.4	80-120	227.5	0.387	20	
1,1,2,2-Tetrachloroethane	260.1	25	250	0	104	72-120	257.7	0.905	20	
1,1,2-Trichlor-1,2,2-trifluoroethane	189.3	25	250	0	75.7	73-123	210.9	10.8	20	
1,1,2-Trichloroethane	248.3	25	250	0	99.3	80-120	243.9	1.78	20	
1,1-Dichloroethane	236.4	25	250	0	94.5	76-120	233.6	1.18	20	
1,1-Dichloroethene	226.1	25	250	0	90.4	73-124	222.3	1.68	20	
1,2,4-Trichlorobenzene	209.7	25	250	0	83.9	80-120	233.4	10.7	20	
1,2-Dibromo-3-chloropropane	285.3	25	250	0	114	65-125	247.2	14.3	20	
1,2-Dibromoethane	250.8	25	250	0	100	80-120	256.6	2.3	20	
1,2-Dichlorobenzene	231	25	250	0	92.4	80-120	235.5	1.94	20	
1,2-Dichloroethane	435.2	25	250	208.8	90.6	78-120	445.8	2.41	20	
1,2-Dichloropropane	242.9	25	250	0	97.2	80-120	243.5	0.241	20	
1,3-Dichlorobenzene	220.3	25	250	0	88.1	80-120	231.4	4.9	20	
1,4-Dichlorobenzene	216.8	25	250	0	86.7	80-120	223.8	3.21	20	
2-Butanone	533.4	50	500	0	107	58-132	512.4	4.01	20	
2-Hexanone	551	50	500	0	110	61-130	521.4	5.52	20	
4-Methyl-2-pentanone	543.4	50	500	0	109	65-127	544	0.107	20	
Acetone	477.3	50	500	0	95.5	59-137	467.3	2.13	20	
Benzene	238.2	25	250	1.727	94.6	73-121	240.7	1.05	20	
Bromodichloromethane	255.7	25	250	0	102	80-120	248.5	2.86	20	
Bromoform	245.6	25	250	0	98.2	79-120	251.2	2.25	20	
Bromomethane	254.8	25	250	0	102	66-137	247.5	2.92	20	
Carbon disulfide	458.8	50	500	0	91.8	68-141	456.3	0.549	20	
Carbon tetrachloride	193	25	250	0	77.2	75-124	196.5	1.78	20	
Chlorobenzene	231.5	25	250	0	92.6	80-120	235.4	1.69	20	
Chloroethane	243.8	25	250	0	97.5	76-121	243.2	0.239	20	
Chloroform	241.4	25	250	0	96.6	80-120	234.5	2.89	20	
Chloromethane	264.8	25	250	0	106	67-123	266.6	0.643	20	
cis-1,2-Dichloroethene	248.7	25	250	0	99.5	78-120	244.1	1.88	20	
cis-1,3-Dichloropropene	254.4	25	250	0	102	80-120	254.7	0.1	20	
Cyclohexane	184.3	25	250	0	73.7	66-125	211.1	13.5	20	
Dibromochloromethane	255.7	25	250	0	102	80-120	253.5	0.848	20	
Dichlorodifluoromethane	212.8	25	250	0	85.1	63-125	221.7	4.13	20	
Ethylbenzene	219.6	25	250	0	87.8	80-120	230.4	4.78	20	
Isopropylbenzene	208.1	25	250	0	83.2	80-120	231	10.4	20	
Methyl acetate	261.2	25	250	0	104	60-130	260.6	0.215	20	
Methyl tert-butyl ether	291.8	25	250	33.46	103	73-121	287.5	1.47	20	
Methylcyclohexane	172.9	25	250	0	69.2	75-122	214.5	21.5	20	SR
Styrene	227	25	250	0	90.8	80-120	235.9	3.84	20	
Tetrachloroethene	204.6	25	250	0	81.9	79-120	211.8	3.42	20	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802327  
**Project:** Oro grande LF-Derived Waste

## QC BATCH REPORT

Batch ID: <b>R60091</b>		Instrument ID <b>VOA2</b>		Method: <b>SW8260</b>					
Toluene	233	25	250	0	93.2	80-120	236.4	1.45	20
trans-1,2-Dichloroethene	238.5	25	250	0	95.4	78-120	233.3	2.23	20
trans-1,3-Dichloropropene	256.8	25	250	0	103	80-120	252.8	1.59	20
Trichloroethene	225.8	25	250	0	90.3	80-120	230.8	2.17	20
Trichlorofluoromethane	207	25	250	0	82.8	72-130	216.3	4.38	20
Vinyl chloride	237	10	250	0	94.8	70-127	230	3	20
Xylenes, Total	664.7	75	750	0	88.6	80-120	697.4	4.8	20
<i>Surr: 1,2-Dichloroethane-d4</i>	<i>206.5</i>	<i>25</i>	<i>250</i>	<i>0</i>	<i>82.6</i>	<i>70-125</i>	<i>205</i>	<i>0.758</i>	<i>20</i>
<i>Surr: 4-Bromofluorobenzene</i>	<i>215.4</i>	<i>25</i>	<i>250</i>	<i>0</i>	<i>86.2</i>	<i>72-125</i>	<i>214.8</i>	<i>0.296</i>	<i>20</i>
<i>Surr: Dibromofluoromethane</i>	<i>219.2</i>	<i>25</i>	<i>250</i>	<i>0</i>	<i>87.7</i>	<i>71-125</i>	<i>213.3</i>	<i>2.76</i>	<i>20</i>
<i>Surr: Toluene-d8</i>	<i>223.5</i>	<i>25</i>	<i>250</i>	<i>0</i>	<i>89.4</i>	<i>75-125</i>	<i>225.9</i>	<i>1.05</i>	<i>20</i>

The following samples were analyzed in this batch:

0802327-01A	0802327-02A
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ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 24 of 24

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: Contract:  
Lab Code: Case No.: SAS No.: SDG No.: 0802327  
Instrument ID: VOA2 Calibration Date(s): 02/19/08 02/19/08  
Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1043 1333

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2
		A0	A1	A2	
Dichlorodifluoromethane	LINR	-1.14e-002	1.26394884		1.000
Chloromethane	LINR	-6.73e-002	1.72662381		0.994
Vinyl Chloride	AVRG		0.61617669		4.0
Bromomethane	AVRG		0.45378753		9.5
Chloroethane	AVRG		0.35896662		3.5
Trichlorofluoromethane	AVRG		1.31872428		3.9
Acetone	AVRG		0.17534955		10.1
1,1-Dichloroethene	AVRG		0.57061788		4.4
Methylene Chloride	AVRG		0.62468961		10.0
Carbon Disulfide	AVRG		1.56846817		4.7
trans-1,2-Dichloroethene	AVRG		0.63979262		2.7
1,1-Dichloroethane	AVRG		1.16181010		3.3
2-Butanone	AVRG		0.19739956		4.9
cis-1,2-Dichloroethene	AVRG		0.67454991		3.6
Chloroform	AVRG		1.27851438		4.3
1,1,1-Trichloroethane	AVRG		1.16115250		7.5
1,2-Dichloroethane	AVRG		0.86599971		5.4
Carbon Tetrachloride	AVRG		0.88427795		14.2
Benzene	AVRG		1.68974573		3.8
Trichloroethene	AVRG		0.55168985		5.1
Bromodichloromethane	AVRG		0.67897336		7.2
1,2-Dichloropropane	AVRG		0.38743283		3.9
4-Methyl-2-Pentanone	AVRG		0.31689932		5.8
cis-1,3-Dichloropropene	AVRG		0.66816462		9.2
Toluene	AVRG		2.03914609		2.3
trans-1,3-Dichloropropene	AVRG		0.63862269		12.4
2-Hexanone	AVRG		0.21228939		7.6
1,1,2-Trichloroethane	AVRG		0.32247132		6.6
Dibromochloromethane	AVRG		0.53375102		12.4
Tetrachloroethene	AVRG		0.48443397		2.6
1,2-Dibromoethane	AVRG		0.44609722		2.6
Chlorobenzene	AVRG		1.52220947		5.8
Ethylbenzene	AVRG		0.81045562		4.2
m,p-Xylenes	AVRG		0.96801724		2.1
o-Xylene	AVRG		0.94211712		1.5
Styrene	AVRG		1.61779510		2.2
Bromoform	2ORDR	2.694e-002	3.06291181	-0.3223803	1.000

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_  
 Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802327  
 Instrument ID: VOA2 Calibration Date(s): 02/19/08 02/19/08  
 Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1043 1333

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2
		A0	A1	A2	
Isopropylbenzene	AVRG		1.96708612		5.5
1,1,2,2-Tetrachloroethane	AVRG		0.72094158		8.2
1,3-Dichlorobenzene	AVRG		2.17919946		7.3
1,4-Dichlorobenzene	AVRG		2.25585579		8.7
1,2-Dichlorobenzene	AVRG		2.06971932		6.5
1,2-Dibromo-3-Chloropropane	2ORDR	1.535e-002	7.32536170	-2.0442741	1.000
1,2,4-Trichlorobenzene	AVRG		0.82572446		6.2
Methyl tert-butyl ether	AVRG		1.50687929		4.6
Methylcyclohexane	AVRG		0.53479675		9.8
Cyclohexane	AVRG		0.91903410		5.2
Freon TF	AVRG		0.58449924		4.0
Methyl Acetate	AVRG		0.67116681		10.4
Dibromofluoromethane	AVRG		0.57787679		2.7
1,2-Dichloroethane-d4	AVRG		0.81012954		2.5
Toluene-d8	AVRG		1.50909682		5.0
4-Bromofluorobenzene	LINR	5.889e-003	1.52976175		1.000

FORM VI VOA



FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802327

Instrument ID: VOA2 Calibration Date(s): 02/19/08 02/19/08

Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1043 1333

LAB FILE ID: RF2.5: D021903 RF5: D021904 RF10: D021905  
RF20: D021906 RF50: D021907

COMPOUND	RF2.5	RF5	RF10	RF20	RF50
Dichlorodifluoromethane	0.848	0.915	0.780	0.791	0.800
Chloromethane	0.678	0.727	0.653	0.658	0.670
Vinyl Chloride	0.624	0.646	0.602	0.598	0.633
Bromomethane	0.512	0.470	0.445	0.462	0.471
Chloroethane	0.370	0.347	0.352	0.349	0.365
Trichlorofluoromethane	1.293	1.389	1.278	1.226	1.316
Acetone	0.212	0.184	0.185	0.157	0.161
1,1-Dichloroethene	0.541	0.616	0.551	0.552	0.574
Methylene Chloride	0.772	0.634	0.608	0.592	0.607
Carbon Disulfide	1.493	1.538	1.497	1.502	1.613
trans-1,2-Dichloroethene	0.656	0.632	0.632	0.614	0.638
1,1-Dichloroethane	1.241	1.190	1.135	1.120	1.148
2-Butanone	0.209	0.182	0.207	0.188	0.196
cis-1,2-Dichloroethene	0.715	0.689	0.659	0.644	0.687
Chloroform	1.398	1.296	1.279	1.223	1.257
1,1,1-Trichloroethane	1.078	1.079	1.078	1.104	1.177
1,2-Dichloroethane	0.976	0.870	0.856	0.821	0.856
Carbon Tetrachloride	1.178	0.893	0.809	0.774	0.824
Benzene	1.762	1.778	1.705	1.638	1.704
Trichloroethene	0.610	0.544	0.529	0.520	0.566
Bromodichloromethane	0.618	0.633	0.638	0.648	0.713
1,2-Dichloropropane	0.398	0.412	0.372	0.376	0.401
4-Methyl-2-Pentanone	0.314	0.287	0.321	0.294	0.320
cis-1,3-Dichloropropene	0.602	0.615	0.606	0.626	0.701
Toluene	2.050	2.058	2.009	1.939	2.038
trans-1,3-Dichloropropene	0.566	0.552	0.584	0.575	0.656
2-Hexanone	0.189	0.193	0.232	0.206	0.206
1,1,2-Trichloroethane	0.367	0.341	0.319	0.305	0.318
Dibromochloromethane	0.461	0.461	0.489	0.497	0.542
Tetrachloroethene	0.481	0.502	0.483	0.458	0.480
1,2-Dibromoethane	0.447	0.425	0.457	0.436	0.438
Chlorobenzene	1.714	1.587	1.477	1.454	1.504
Ethylbenzene	0.796	0.869	0.752	0.792	0.805
m,p-Xylenes	0.996	0.963	0.950	0.938	0.980
o-Xylene	0.949	0.938	0.963	0.930	0.958
Styrene	1.658	1.597	1.598	1.556	1.639
Bromoform	0.271	0.263	0.284	0.283	0.327

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802327

Instrument ID: VOA2 Calibration Date(s): 02/19/08 02/19/08

Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1043 1333

LAB FILE ID: RF2.5: D021903 RF5: D021904 RF10: D021905  
RF20: D021906 RF50: D021907

COMPOUND	RF2.5	RF5	RF10	RF20	RF50
=====	=====	=====	=====	=====	=====
Isopropylbenzene	1.833	1.868	1.862	1.919	2.025
1,1,2,2-Tetrachloroethane	0.808	0.739	0.802	0.677	0.694
1,3-Dichlorobenzene	2.520	2.294	2.137	2.024	2.123
1,4-Dichlorobenzene	2.662	2.417	2.291	2.139	2.154
1,2-Dichlorobenzene	2.313	2.213	2.117	1.979	2.033
1,2-Dibromo-3-Chloropropane	0.057	0.124	0.148	0.127	0.136
1,2,4-Trichlorobenzene	0.881	0.729	0.826	0.789	0.803
Methyl tert-butyl ether	1.633	1.505	1.488	1.393	1.456
Methylcyclohexane	0.416	0.520	0.536	0.530	0.558
Cyclohexane	0.938	0.995	0.868	0.860	0.880
Freon TF	0.555	0.609	0.579	0.551	0.582
Methyl Acetate	0.796	0.728	0.708	0.571	0.642
=====	=====	=====	=====	=====	=====
Dibromofluoromethane	0.572	0.590	0.564	0.553	0.575
1,2-Dichloroethane-d4	0.830	0.831	0.836	0.785	0.799
Toluene-d8	1.356	1.556	1.469	1.478	1.495
4-Bromofluorobenzene	0.637	0.672	0.668	0.639	0.646

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802327

Instrument ID: VOA2 Calibration Date(s): 02/19/08 02/19/08

Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1043 1333

LAB FILE ID: RF100: D021908 RF150: D021909 RF200: D021910

COMPOUND	RF100	RF150	RF200
Dichlorodifluoromethane	0.820	0.792	0.789
Chloromethane	0.666	0.582	0.572
Vinyl Chloride	0.646	0.602	0.578
Bromomethane	0.486	0.379	0.405
Chloroethane	0.382	0.358	0.348
Trichlorofluoromethane	1.359	1.342	1.348
Acetone	0.167	0.168	0.169
1,1-Dichloroethene	0.588	0.586	0.558
Methylene Chloride	0.616	0.601	0.566
Carbon Disulfide	1.675	1.660	1.569
trans-1,2-Dichloroethene	0.662	0.658	0.625
1,1-Dichloroethane	1.168	1.152	1.140
2-Butanone	0.201	0.203	0.192
cis-1,2-Dichloroethene	0.685	0.673	0.645
Chloroform	1.280	1.267	1.227
1,1,1-Trichloroethane	1.245	1.257	1.271
1,2-Dichloroethane	0.851	0.846	0.851
Carbon Tetrachloride	0.833	0.877	0.887
Benzene	1.694	1.657	1.580
Trichloroethene	0.559	0.550	0.535
Bromodichloromethane	0.726	0.724	0.731
1,2-Dichloropropane	0.391	0.381	0.369
4-Methyl-2-Pentanone	0.328	0.331	0.341
cis-1,3-Dichloropropene	0.735	0.736	0.724
Toluene	2.084	2.059	2.075
trans-1,3-Dichloropropene	0.701	0.724	0.751
2-Hexanone	0.224	0.221	0.228
1,1,2-Trichloroethane	0.314	0.309	0.307
Dibromochloromethane	0.590	0.604	0.625
Tetrachloroethene	0.493	0.487	0.491
1,2-Dibromoethane	0.457	0.450	0.457
Chlorobenzene	1.501	1.474	1.466
Ethylbenzene	0.838	0.819	0.812
m,p-Xylenes	0.993	0.966	0.959
o-Xylene	0.947	0.924	0.928
Styrene	1.666	1.612	1.616
Bromoform	0.352	0.364	0.388

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802327

Instrument ID: VOA2 Calibration Date(s): 02/19/08 02/19/08

Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1043 1333

LAB FILE ID: RF100: D021908 RF150: D021909 RF200: D021910

COMPOUND	RF100	RF150	RF200
Isopropylbenzene	2.089	2.039	2.102
1,1,2,2-Tetrachloroethane	0.717	0.689	0.641
1,3-Dichlorobenzene	2.159	2.129	2.048
1,4-Dichlorobenzene	2.176	2.137	2.071
1,2-Dichlorobenzene	2.019	1.965	1.918
1,2-Dibromo-3-Chloropropane	0.152	0.154	0.168
1,2,4-Trichlorobenzene	0.847	0.851	0.879
Methyl tert-butyl ether	1.522	1.541	1.516
Methylcyclohexane	0.584	0.566	0.569
Cyclohexane	0.957	0.947	0.907
Freon TF	0.610	0.604	0.586
Methyl Acetate	0.652	0.635	0.637
Dibromofluoromethane	0.594	0.599	0.575
1,2-Dichloroethane-d4	0.816	0.797	0.789
Toluene-d8	1.577	1.572	1.570
4-Bromofluorobenzene	0.647	0.646	0.658

FORM VI VOA

FORM 7  
VOLATILE CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802327

Instrument ID: VOA2 Calibration Date: 02/19/08 Time: 1544

Lab File ID: E021902 Init. Calib. Date(s): 02/19/08 02/19/08

Heated Purge: (Y/N) N Init. Calib. Times: 1043 1333

GC Column: DB624 ID: 0.18 (mm)

COMPOUND	SAMPLE AMOUNT	CAL50 AMOUNT	CURVE	%D	MAX %d
Dichlorodifluoromethane	47.91	50.00	LINR	4.2	20.0
Chloromethane	52.12	50.00	LINR	4.2	20.0
Vinyl Chloride	47.56	50.00	AVRG	4.9	20.0
Bromomethane	48.78	50.00	AVRG	2.4	20.0
Chloroethane	49.19	50.00	AVRG	1.6	20.0
Trichlorofluoromethane	46.34	50.00	AVRG	7.3	20.0
Acetone	86.48	100.00	AVRG	13.5	20.0
1,1-Dichloroethene	45.17	50.00	AVRG	9.7	20.0
Methylene Chloride	45.30	50.00	AVRG	9.4	20.0
Carbon Disulfide	92.60	100.00	AVRG	7.4	20.0
trans-1,2-Dichloroethene	46.18	50.00	AVRG	7.6	20.0
1,1-Dichloroethane	44.89	50.00	AVRG	10.2	20.0
2-Butanone	95.45	100.00	AVRG	4.6	20.0
cis-1,2-Dichloroethene	47.36	50.00	AVRG	5.3	20.0
Chloroform	46.10	50.00	AVRG	7.8	20.0
1,1,1-Trichloroethane	47.78	50.00	AVRG	4.4	20.0
1,2-Dichloroethane	48.04	50.00	AVRG	3.9	20.0
Carbon Tetrachloride	42.88	50.00	AVRG	14.2	20.0
Benzene	47.72	50.00	AVRG	4.6	20.0
Trichloroethene	47.89	50.00	AVRG	4.2	20.0
Bromodichloromethane	48.70	50.00	AVRG	2.6	20.0
1,2-Dichloropropane	47.07	50.00	AVRG	5.9	20.0
4-Methyl-2-Pentanone	94.80	100.00	AVRG	5.2	20.0
cis-1,3-Dichloropropene	49.84	50.00	AVRG	0.3	20.0
Toluene	48.08	50.00	AVRG	3.8	20.0
trans-1,3-Dichloropropene	50.25	50.00	AVRG	0.5	20.0
2-Hexanone	98.95	100.00	AVRG	1.0	20.0
1,1,2-Trichloroethane	46.40	50.00	AVRG	7.2	20.0
Dibromochloromethane	49.40	50.00	AVRG	1.2	20.0
Tetrachloroethene	46.74	50.00	AVRG	6.5	20.0
1,2-Dibromoethane	47.11	50.00	AVRG	5.8	20.0
Chlorobenzene	46.74	50.00	AVRG	6.5	20.0
Ethylbenzene	47.01	50.00	AVRG	6.0	20.0
m,p-Xylenes	95.75	100.00	AVRG	4.2	20.0
o-Xylene	47.59	50.00	AVRG	4.8	20.0
Styrene	47.91	50.00	AVRG	4.2	20.0
Bromoform	46.18	50.00	2ORDR	7.6	20.0

FORM 7  
VOLATILE CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802327

Instrument ID: VOA2 Calibration Date: 02/19/08 Time: 1544

Lab File ID: E021902 Init. Calib. Date(s): 02/19/08 02/19/08

Heated Purge: (Y/N) N Init. Calib. Times: 1043 1333

GC Column: DB624 ID: 0.18 (mm)

COMPOUND	SAMPLE AMOUNT	CAL50 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
Isopropylbenzene	48.80	50.00	AVRG	2.4	20.0
1,1,2,2-Tetrachloroethane	46.01	50.00	AVRG	8.0	20.0
1,3-Dichlorobenzene	46.88	50.00	AVRG	6.2	20.0
1,4-Dichlorobenzene	44.90	50.00	AVRG	10.2	20.0
1,2-Dichlorobenzene	46.88	50.00	AVRG	6.2	20.0
1,2-Dibromo-3-Chloropropane	50.25	50.00	2ORDR	0.5	20.0
1,2,4-Trichlorobenzene	50.84	50.00	AVRG	1.7	20.0
Methyl tert-butyl ether	47.21	50.00	AVRG	5.6	20.0
Methylcyclohexane	50.56	50.00	AVRG	1.1	20.0
Cyclohexane	44.87	50.00	AVRG	10.3	20.0
Freon TF	46.88	50.00	AVRG	6.2	20.0
Methyl Acetate	40.78	50.00	AVRG	18.4	20.0
=====	=====	=====	=====	=====	=====
Dibromofluoromethane	41.82	50.00	AVRG	16.4	20.0
1,2-Dichloroethane-d4	40.25	50.00	AVRG	19.5	20.0
Toluene-d8	44.59	50.00	AVRG	10.8	20.0
4-Bromofluorobenzene	42.92	50.00	LINR	14.2	20.0

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802327

Instrument ID: SV2 Calibration Date(s): 02/20/08 02/20/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1135 1351

LAB FILE ID: RF0.2: 04 RF0.5: 05 RF1: 06  
RF2.5: 03 RF5: 07

COMPOUND	RF0.2	RF0.5	RF1	RF2.5	RF5
Phenol	1.652	1.574	1.588	1.729	1.777
Bis(2-chloroethyl) ether	1.340	1.349	1.340	1.376	1.435
2-Chlorophenol	1.423	1.290	1.440	1.446	1.526
2-Methylphenol	1.460	1.188	1.202	1.351	1.448
bis(2-Chloroisopropyl) ether	0.560	0.456	0.534	0.527	0.509
3&4-Methylphenol	1.604	1.477	1.396	1.531	1.612
N-Nitroso-di-n-propylamine	1.115	0.970	1.052	1.053	1.077
Hexachloroethane	0.790	0.703	0.641	0.655	0.682
Nitrobenzene	0.401	0.358	0.391	0.408	0.384
Isophorone	0.616	0.625	0.677	0.679	0.633
2-Nitrophenol	0.202	0.186	0.187	0.187	0.194
2,4-Dimethylphenol	0.270	0.321	0.326	0.337	0.330
Bis(2-chloroethoxy) methane	0.416	0.454	0.428	0.435	0.451
2,4-Dichlorophenol	0.237	0.257	0.256	0.273	0.268
Naphthalene	1.189	1.109	1.101	1.147	1.118
4-Chloroaniline	0.500	0.414	0.448	0.473	0.457
Hexachlorobutadiene	0.143	0.132	0.138	0.146	0.132
4-Chloro-3-Methylphenol	0.278	0.319	0.331	0.315	0.306
2-Methylnaphthalene	0.503	0.531	0.534	0.565	0.537
Hexachlorocyclopentadiene	0.285	0.262	0.256	0.305	0.300
2,4,6-Trichlorophenol	0.360	0.310	0.294	0.335	0.329
2,4,5-Trichlorophenol	0.302	0.328	0.351	0.368	0.347
2-Chloronaphthalene	1.236	1.086	1.208	1.143	1.081
2-Nitroaniline	0.494	0.391	0.378	0.442	0.445
Dimethylphthalate	1.381	1.286	1.278	1.295	1.309
Acenaphthylene	1.934	1.681	1.761	1.979	1.981
2,6-Dinitrotoluene	0.268	0.294	0.288	0.297	0.288
3-Nitroaniline	0.407	0.316	0.320	0.349	0.352
Acenaphthene	1.081	1.082	1.088	1.140	1.152
2,4-Dinitrophenol	0.106	0.091	0.096	0.123	0.136
Dibenzofuran	1.594	1.527	1.549	1.601	1.620
4-Nitrophenol	0.226	0.170	0.170	0.215	0.200
2,4-Dinitrotoluene	0.295	0.280	0.307	0.370	0.352
Diethylphthalate	1.297	1.189	1.240	1.437	1.364
4-Chlorophenyl phenyl ether	0.537	0.475	0.534	0.566	0.568
Fluorene	1.305	1.226	1.315	1.347	1.336
4-Nitroaniline	0.285	0.305	0.322	0.362	0.376

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802327

Instrument ID: SV2

Calibration Date(s): 02/20/08 02/20/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1135 1351

LAB FILE ID: RF0.2: 04

RF0.5: 05

RF1: 06

RF2.5: 03

RF5: 07

COMPOUND	RF0.2	RF0.5	RF1	RF2.5	RF5
4,6-Dinitro-2-methylphenol	0.114	0.107	0.141	0.189	0.200
N-Nitrosodiphenylamine	1.048	1.160	1.144	1.294	1.256
4-Bromophenyl-phenylether	0.331	0.290	0.327	0.370	0.332
Hexachlorobenzene	0.345	0.342	0.372	0.386	0.363
Pentachlorophenol	0.208	0.184	0.158	0.191	0.183
Phenanthrene	1.229	1.084	1.108	1.223	1.228
Anthracene	1.120	1.092	1.062	1.186	1.157
Carbazole	0.965	0.891	0.990	1.072	1.085
Di-n-butylphthalate	1.512	1.370	1.430	1.612	1.563
Fluoranthene	0.939	1.008	1.043	1.088	1.087
Pyrene	1.470	1.544	1.424	1.570	1.568
Butylbenzylphthalate	0.856	0.855	0.776	1.042	0.938
Benzo(a)Anthracene	1.181	1.170	1.117	1.204	1.206
3,3'-Dichlorobenzidine	0.432	0.424	0.426	0.493	0.470
bis(2-ethylhexyl)phthalate	1.417	1.157	1.119	1.405	1.256
Chrysene	1.032	1.123	1.095	1.250	1.214
Di-n-octylphthalate	1.863	1.603	1.865	2.155	2.004
Benzo(b)fluoranthene	1.090	0.930	1.086	1.299	1.078
Benzo(k)fluoranthene	1.040	1.214	1.193	1.147	1.330
Benzo(a)pyrene	1.028	0.900	1.091	1.100	1.054
Indeno(1,2,3-cd)pyrene	1.066	0.801	0.871	0.941	1.009
Dibenzo(a,h)anthracene	0.890	0.952	0.947	1.025	1.044
Benzo(g,h,i)perylene	1.117	0.957	1.126	1.123	1.086
Acetophenone	0.537	0.505	0.533	0.504	0.504
Caprolactam	0.134	0.110	0.117	0.121	0.110
1,1'-Biphenyl	1.542	1.427	1.426	1.528	1.566
Benzaldehyde	1.205	1.011	1.080	1.143	1.186
Atrazine	0.322	0.275	0.292	0.377	0.364
Phenol-d6	1.893	1.865	1.742	1.749	1.853
2-Fluorophenol	1.370	1.112	1.207	1.365	1.472
Nitrobenzene-d5	0.374	0.360	0.405	0.420	0.395
2-Fluorobiphenyl	1.308	1.239	1.278	1.373	1.380
2,4,6-Tribromophenol	0.184	0.178	0.170	0.183	0.188
4-Terphenyl-d14	0.868	0.861	0.856	0.942	0.944

FORM VI SV



FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802327

Instrument ID: SV2

Calibration Date(s): 02/20/08 02/20/08

Column: RTX-5SIL MS ID: 0.28 (mm)

Calibration Time(s): 1135 1351

LAB FILE ID:

RF7.5: 08

RF10: 09

COMPOUND	RF7.5	RF10
Phenol	1.799	1.737
Bis(2-chloroethyl) ether	1.425	1.332
2-Chlorophenol	1.512	1.525
2-Methylphenol	1.405	1.365
bis(2-Chloroisopropyl) ether	0.488	0.484
3&4-Methylphenol	1.576	1.524
N-Nitroso-di-n-propylamine	1.074	1.045
Hexachloroethane	0.676	0.650
Nitrobenzene	0.364	0.377
Isophorone	0.631	0.636
2-Nitrophenol	0.174	0.174
2,4-Dimethylphenol	0.315	0.290
Bis(2-chloroethoxy) methane	0.424	0.433
2,4-Dichlorophenol	0.255	0.253
Naphthalene	1.072	1.079
4-Chloroaniline	0.448	0.440
Hexachlorobutadiene	0.124	0.125
4-Chloro-3-Methylphenol	0.289	0.296
2-Methylnaphthalene	0.529	0.525
Hexachlorocyclopentadiene	0.298	0.293
2,4,6-Trichlorophenol	0.320	0.321
2,4,5-Trichlorophenol	0.345	0.357
2-Chloronaphthalene	1.020	1.072
2-Nitroaniline	0.426	0.430
Dimethylphthalate	1.234	1.227
Acenaphthylene	1.886	1.890
2,6-Dinitrotoluene	0.274	0.288
3-Nitroaniline	0.341	0.334
Acenaphthene	1.084	1.065
2,4-Dinitrophenol	0.133	0.133
Dibenzofuran	1.532	1.532
4-Nitrophenol	0.193	0.191
2,4-Dinitrotoluene	0.359	0.348
Diethylphthalate	1.309	1.306
4-Chlorophenyl phenyl ether	0.527	0.527
Fluorene	1.309	1.293
4-Nitroaniline	0.354	0.346

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802327

Instrument ID: SV2 \_\_\_\_\_ Calibration Date(s): 02/20/08 02/20/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1135 1351

LAB FILE ID: RF7.5: 08 RF10: 09

COMPOUND	RF7.5	RF10
=====	=====	=====
4,6-Dinitro-2-methylphenol	0.190	0.189
N-Nitrosodiphenylamine	1.116	1.137
4-Bromophenyl-phenylether	0.308	0.302
Hexachlorobenzene	0.339	0.334
Pentachlorophenol	0.174	0.167
Phenanthrene	1.121	1.108
Anthracene	1.100	1.081
Carbazole	1.005	1.015
Di-n-butylphthalate	1.407	1.386
Fluoranthene	1.005	0.985
Pyrene	1.423	1.500
Butylbenzylphthalate	0.857	0.888
Benzo(a)Anthracene	1.151	1.199
3,3'-Dichlorobenzidine	0.438	0.447
bis(2-ethylhexyl)phthalate	1.181	1.228
Chrysene	1.118	1.173
Di-n-octylphthalate	2.046	2.085
Benzo(b)fluoranthene	1.124	1.157
Benzo(k)fluoranthene	1.283	1.234
Benzo(a)pyrene	1.084	1.118
Indeno(1,2,3-cd)pyrene	0.992	0.998
Dibenzo(a,h)anthracene	1.062	1.097
Benzo(g,h,i)perylene	1.107	1.165
Acetophenone	0.485	0.483
Caprolactam	0.108	0.107
1,1'-Biphenyl	1.462	1.468
Benzaldehyde	1.052	1.105
Atrazine	0.324	0.319
=====	=====	=====
Phenol-d6	1.856	1.761
2-Fluorophenol	1.373	1.404
Nitrobenzene-d5	0.390	0.396
2-Fluorobiphenyl	1.306	1.313
2,4,6-Tribromophenol	0.174	0.173
4-Terphenyl-d14	0.867	0.893

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802327

Instrument ID: SV2 Calibration Date(s): 02/20/08 02/20/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1135 1351

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2
		A0	A1	A2	
Phenol	AVRG		1.69365432		5.3
Bis(2-chloroethyl) ether	AVRG		1.37104966		3.1
2-Chlorophenol	AVRG		1.45185534		5.7
2-Methylphenol	AVRG		1.34561998		8.2
bis(2-Chloroisopropyl) ether	AVRG		0.50839282		6.9
3&4-Methylphenol	AVRG		1.53134491		5.0
N-Nitroso-di-n-propylamine	AVRG		1.05518586		4.2
Hexachloroethane	AVRG		0.68548361		7.4
Nitrobenzene	AVRG		0.38329736		4.8
Isophorone	AVRG		0.64263643		3.9
2-Nitrophenol	AVRG		0.18651897		5.5
2,4-Dimethylphenol	AVRG		0.31271045		7.7
Bis(2-chloroethoxy) methane	AVRG		0.43454102		3.2
2,4-Dichlorophenol	AVRG		0.25704444		4.5
Naphthalene	AVRG		1.11661751		3.6
4-Chloroaniline	AVRG		0.45436463		5.9
Hexachlorobutadiene	AVRG		0.13414957		6.2
4-Chloro-3-Methylphenol	AVRG		0.30512885		6.0
2-Methylnaphthalene	AVRG		0.53211028		3.4
Hexachlorocyclopentadiene	AVRG		0.28554409		6.6
2,4,6-Trichlorophenol	AVRG		0.32420516		6.4
2,4,5-Trichlorophenol	AVRG		0.34266895		6.3
2-Chloronaphthalene	AVRG		1.12077577		7.0
2-Nitroaniline	AVRG		0.42966948		8.9
Dimethylphthalate	AVRG		1.28717893		4.0
Acenaphthylene	AVRG		1.87329474		6.0
2,6-Dinitrotoluene	AVRG		0.28528810		3.7
3-Nitroaniline	AVRG		0.34561963		8.8
Acenaphthene	AVRG		1.09888361		3.0
2,4-Dinitrophenol	AVRG		0.11699946		16.0
Dibenzofuran	AVRG		1.56529776		2.5
4-Nitrophenol	2ORDR	3.908e-002	4.56753626	0.68364379	0.999
2,4-Dinitrotoluene	AVRG		0.33021511		10.7
Diethylphthalate	AVRG		1.30599035		6.1
4-Chlorophenyl phenyl ether	AVRG		0.53352417		5.8
Fluorene	AVRG		1.30459070		3.0
4-Nitroaniline	AVRG		0.33577620		9.7

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802327

Instrument ID: SV2

Calibration Date(s): 02/20/08 02/20/08

Column: RTX-5SIL MS ID: 0.28 (mm)

Calibration Time(s): 1135 1351

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2
		A0	A1	A2	
4,6-Dinitro-2-methylphenol	2ORDR	0.11528262	4.54375460	0.67985371	0.999
N-Nitrosodiphenylamine	AVRG		1.16491656		7.2
4-Bromophenyl-phenylether	AVRG		0.32285930		8.1
Hexachlorobenzene	AVRG		0.35460265		5.4
Pentachlorophenol	AVRG		0.18061091		9.1
Phenanthrene	AVRG		1.15749002		5.7
Anthracene	AVRG		1.11424493		3.9
Carbazole	AVRG		1.00356816		6.5
Di-n-butylphthalate	AVRG		1.46857176		6.4
Fluoranthene	AVRG		1.02212787		5.3
Pyrene	AVRG		1.49985099		4.2
Butylbenzylphthalate	AVRG		0.88741660		9.4
Benzo(a) Anthracene	AVRG		1.17552661		2.8
3,3'-Dichlorobenzidine	AVRG		0.44727398		5.7
bis(2-ethylhexyl)phthalate	AVRG		1.25200171		9.4
Chrysene	AVRG		1.14359912		6.5
Di-n-octylphthalate	AVRG		1.94574662		9.6
Benzo(b) fluoranthene	AVRG		1.10900978		9.9
Benzo(k) fluoranthene	AVRG		1.20593039		7.8
Benzo(a) pyrene	AVRG		1.05366489		7.0
Indeno(1,2,3-cd)pyrene	AVRG		0.95400084		9.5
Dibenzo(a,h)anthracene	AVRG		1.00259551		7.4
Benzo(g,h,i)perylene	AVRG		1.09723415		6.0
Acetophenone	AVRG		0.50722221		4.1
Caprolactam	AVRG		0.11531953		8.6
1,1'-Biphenyl	AVRG		1.48854866		3.8
Benzaldehyde	AVRG		1.11203689		6.4
Atrazine	AVRG		0.32467732		11.1
Phenol-d6	AVRG		1.81717201		3.5
2-Fluorophenol	AVRG		1.32905354		9.4
Nitrobenzene-d5	AVRG		0.39158298		5.1
2-Fluorobiphenyl	AVRG		1.31399271		3.8
2,4,6-Tribromophenol	AVRG		0.17863058		3.6
4-Terphenyl-d14	AVRG		0.89000176		4.3

FORM VI SV

FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: Contract:  
Lab Code: Case No.: SAS No.: SDG No.: 0802327  
Instrument ID: SV2 Calibration Date: 02/20/08 Time: 1442  
Lab File ID: 02 Init. Calib. Date(s): 02/20/08 02/20/08  
Init. Calib. Times: 1135 1351  
GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	SAMPLE AMOUNT	CAL2.5 AMOUNT	CURVE	%D	MAX %d
Phenol	2.57	2.50	AVRG	2.8	20.0
Bis(2-chloroethyl) ether	2.42	2.50	AVRG	3.2	20.0
2-Chlorophenol	2.48	2.50	AVRG	0.8	20.0
2-Methylphenol	2.39	2.50	AVRG	4.4	20.0
bis(2-Chloroisopropyl) ether	2.33	2.50	AVRG	6.8	20.0
3&4-Methylphenol	2.52	2.50	AVRG	0.8	20.0
N-Nitroso-di-n-propylamine	2.39	2.50	AVRG	4.4	20.0
Hexachloroethane	2.28	2.50	AVRG	8.8	20.0
Nitrobenzene	2.38	2.50	AVRG	4.8	20.0
Isophorone	2.42	2.50	AVRG	3.2	20.0
2-Nitrophenol	2.20	2.50	AVRG	12.0	20.0
2,4-Dimethylphenol	2.56	2.50	AVRG	2.4	20.0
Bis(2-chloroethoxy) methane	2.52	2.50	AVRG	0.8	20.0
2,4-Dichlorophenol	2.56	2.50	AVRG	2.4	20.0
Naphthalene	2.42	2.50	AVRG	3.2	20.0
4-Chloroaniline	2.44	2.50	AVRG	2.4	20.0
Hexachlorobutadiene	2.35	2.50	AVRG	6.0	20.0
4-Chloro-3-Methylphenol	2.39	2.50	AVRG	4.4	20.0
2-Methylnaphthalene	2.38	2.50	AVRG	4.8	20.0
Hexachlorocyclopentadiene	2.75	2.50	AVRG	10.0	20.0
2,4,6-Trichlorophenol	2.49	2.50	AVRG	0.4	20.0
2,4,5-Trichlorophenol	2.57	2.50	AVRG	2.8	20.0
2-Chloronaphthalene	2.67	2.50	AVRG	6.8	20.0
2-Nitroaniline	2.45	2.50	AVRG	2.0	20.0
Dimethylphthalate	2.39	2.50	AVRG	4.4	20.0
Acenaphthylene	2.57	2.50	AVRG	2.8	20.0
2,6-Dinitrotoluene	2.37	2.50	AVRG	5.2	20.0
3-Nitroaniline	2.56	2.50	AVRG	2.4	20.0
Acenaphthene	2.51	2.50	AVRG	0.4	20.0
2,4-Dinitrophenol	2.29	2.50	AVRG	8.4	20.0
Dibenzofuran	2.47	2.50	AVRG	1.2	20.0
4-Nitrophenol	2.22	2.50	2ORDR	11.2	20.0
2,4-Dinitrotoluene	2.58	2.50	AVRG	3.2	20.0
Diethylphthalate	2.55	2.50	AVRG	2.0	20.0
4-Chlorophenyl phenyl ether	2.60	2.50	AVRG	4.0	20.0
Fluorene	2.50	2.50	AVRG	0.0	20.0
4-Nitroaniline	2.45	2.50	AVRG	2.0	20.0

FORM VII SV

FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802327

Instrument ID: SV2 Calibration Date: 02/20/08 Time: 1442

Lab File ID: 02 Init. Calib. Date(s): 02/20/08 02/20/08

Init. Calib. Times: 1135 1351

GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	SAMPLE AMOUNT	CAL2.5 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	2.13	2.50	2ORDR	14.8	20.0
N-Nitrosodiphenylamine	2.50	2.50	AVRG	0.0	20.0
4-Bromophenyl-phenylether	2.45	2.50	AVRG	2.0	20.0
Hexachlorobenzene	2.44	2.50	AVRG	2.4	20.0
Pentachlorophenol	2.56	2.50	AVRG	2.4	20.0
Phenanthrene	2.58	2.50	AVRG	3.2	20.0
Anthracene	2.49	2.50	AVRG	0.4	20.0
Carbazole	2.56	2.50	AVRG	2.4	20.0
Di-n-butylphthalate	2.45	2.50	AVRG	2.0	20.0
Fluoranthene	2.56	2.50	AVRG	2.4	20.0
Pyrene	2.70	2.50	AVRG	8.0	20.0
Butylbenzylphthalate	2.62	2.50	AVRG	4.8	20.0
Benzo (a) Anthracene	2.64	2.50	AVRG	5.6	20.0
3,3'-Dichlorobenzidine	2.74	2.50	AVRG	9.6	20.0
bis(2-ethylhexyl)phthalate	2.54	2.50	AVRG	1.6	20.0
Chrysene	2.75	2.50	AVRG	10.0	20.0
Di-n-octylphthalate	2.47	2.50	AVRG	1.2	20.0
Benzo (b) fluoranthene	2.51	2.50	AVRG	0.4	20.0
Benzo (k) fluoranthene	2.52	2.50	AVRG	0.8	20.0
Benzo (a) pyrene	2.58	2.50	AVRG	3.2	20.0
Indeno (1,2,3-cd) pyrene	2.42	2.50	AVRG	3.2	20.0
Dibenzo (a,h) anthracene	2.36	2.50	AVRG	5.6	20.0
Benzo (g,h,i) perylene	2.56	2.50	AVRG	2.4	20.0
Acetophenone	2.29	2.50	AVRG	8.4	20.0
Caprolactam	2.21	2.50	AVRG	11.6	20.0
1,1'-Biphenyl	2.49	2.50	AVRG	0.4	20.0
Benzaldehyde	2.59	2.50	AVRG	3.6	20.0
Atrazine	2.56	2.50	AVRG	2.4	20.0
=====	=====	=====	=====	=====	=====
Phenol-d6	2.51	2.50	AVRG	0.4	20.0
2-Fluorophenol	2.53	2.50	AVRG	1.2	20.0
Nitrobenzene-d5	2.41	2.50	AVRG	3.6	20.0
2-Fluorobiphenyl	2.43	2.50	AVRG	2.8	20.0
2,4,6-Tribromophenol	2.64	2.50	AVRG	5.6	20.0
4-Terphenyl-d14	2.56	2.50	AVRG	2.4	20.0

FORM VII SV

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53

(mm)

Calibration Time(s): 1519

1810

LAB FILE ID:

RF0.005: 006

RF0.01: 007

RF0.02: 008

RF0.04: 009

RF0.06: 010

RF0.08: 011

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
alpha-BHC	4703	9952	20806	49102	76316	112985
gamma-BHC	4917	10317	21430	49512	75715	110507
Heptachlor	1337400.0	1355800.0	1326400.0	1403625.0	1369433.3	1452975.0
Endosulfan I	315400.00	320900.00	310700.00	319900.00	309400.00	322887.50
Dieldrin	1055000.0	1090600.0	1090375.0	1183612.5	1173325.0	1253556.3
Endrin	797400.00	797850.00	802650.00	867850.00	849391.67	916862.50
4,4'-DDD	738000.00	767900.00	801300.00	889762.50	889050.00	961175.00
4,4'-DDT	946100.00	991500.00	1004225.0	1085512.5	1072158.3	1147662.5
Methoxychlor	639420.00	643240.00	623200.00	617895.00	584006.67	604390.00
Tetrachloro-m-xylene	1156200.0	1163100.0	1130500.0	1145300.0	1082450.0	1118837.5
Decachlorobiphenyl	1742300.0	1717600.0	1596650.0	1531712.5	1418600.0	1451331.3

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53 (mm)

Calibration Time(s): 1519

1810

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2	MAX %RSD OR R^2
		A0	A1	A2		
alpha-BHC	2ORDR	1.213e-003	8.968e-007	-1.76e-012	0.9994761	0.9900000
gamma-BHC	2ORDR	9.75e-004	8.859e-007	-1.53e-012	0.9994627	0.9900000
Heptachlor	AVRG		1374272.22		3.424	20.000
Endosulfan I	AVRG		316531.250		1.770	20.000
Dieldrin	AVRG		1141078.13		6.561	20.000
Endrin	AVRG		838667.361		5.780	20.000
4,4'-DDD	AVRG		841197.917		10.179	20.000
4,4'-DDT	AVRG		1041193.06		7.076	20.000
Methoxychlor	AVRG		618691.944		3.586	20.000
Tetrachloro-m-xylene	AVRG		1132731.25		2.606	20.000
Decachlorobiphenyl	AVRG		1576365.63		8.530	20.000

FORM VI PEST



FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53

(mm)

Calibration Time(s): 1844

2135

LAB FILE ID:

RF0.005: 012

RF0.01: 013.

RF0.02: 014

RF0.04: 015

RF0.06: 016

RF0.08: 017

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
beta-BHC	779600.00	682900.00	819250.00	774400.00	747550.00	757150.00
delta-BHC	4316	7873	20636	43136	67306	96565
Aldrin	1224000.0	1076600.0	1321850.0	1292725.0	1286950.0	1340325.0
Heptachlor epoxide	1407600.0	1155900.0	1415250.0	1299000.0	1260716.7	1287600.0
gamma-Chlordane	1396800.0	1205000.0	1430100.0	1346200.0	1308966.7	1337712.5
alpha-Chlordane	1371200.0	1193800.0	1412950.0	1339425.0	1321066.7	1346712.5
4,4'-DDE	303600.00	272750.00	343575.00	336837.50	328391.67	334500.00
Endosulfan II	1165100.0	1008900.0	1218525.0	1149975.0	1121858.3	1143275.0
Endrin aldehyde	1103800.0	929950.00	1104450.0	994512.50	953983.33	953756.25
Endosulfan sulfate	1034600.0	890200.00	1056650.0	998475.00	962850.00	988568.75
Endrin ketone	1211700.0	1052500.0	1293750.0	1232637.5	1197025.0	1225406.3

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53 (mm)

Calibration Time(s): 1844

2135

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2	MAX %RSD OR R^2
		A0	A1	A2		
beta-BHC	AVRG		760141.667		5.944	20.000
delta-BHC	2ORDR	1.36e-003	9.701e-007	-1.59e-012	0.9994617	0.9900000
Aldrin	AVRG		1257075.00		7.709	20.000
Heptachlor epoxide	AVRG		1304344.44		7.450	20.000
gamma-Chlordane	AVRG		1337463.19		5.843	20.000
alpha-Chlordane	AVRG		1330859.03		5.580	20.000
4,4'-DDE	AVRG		319942.361		8.412	20.000
Endosulfan II	AVRG		1134605.56		6.138	20.000
Endrin aldehyde	AVRG		1006742.01		7.771	20.000
Endosulfan sulfate	AVRG		988557.292		5.931	20.000
Endrin ketone	AVRG		1202169.79		6.693	20.000

FORM VI PEST

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i      Injection Date: 24-FEB-2008 10:40  
Lab File ID: 040.D      Init. Cal. Date(s): 23-FEB-2008    23-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    15:19      21:35  
Lab Sample ID: INDB-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	REF0.020	CCAL	MIN	MAX	CURVE TYPE
			RRF0.020	RRF	%D / %DRIFT	%D / %DRIFT
14 beta-BHC	760142	778350	778350	0.010	-2.39539	15.00000
15 delta-BHC	0.02000	0.01997	991700	0.010	0.12774	15.00000
17 Aldrin	1257075	1236900	1236900	0.010	1.60492	15.00000
18 Heptachlor epoxide	1304344	1335600	1335600	0.010	-2.39627	15.00000
19 gamma-Chlordane	1337463	1352350	1352350	0.010	-1.11306	15.00000
110 alpha-Chlordane	1330859	1307200	1307200	0.010	1.77773	15.00000
112 4,4'-DDE	319942	334425	334425	0.010	-4.52664	15.00000
116 Endosulfan II	1134606	1188675	1188675	0.010	-4.76548	15.00000
118 Endrin aldehyde	1006742	1101675	1101675	0.010	-9.42972	15.00000
119 Endosulfan sulfate	988557	1088675	1088675	0.010	-10.12766	15.00000
121 Endrin ketone	1202170	1347550	1347550	0.010	-12.09315	15.00000

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 11:53  
 Lab File ID: 042.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDA-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1 Tetrachloro-m-xylene	1132731	1096050	1096050	0.010	3.23830	15.00000	Averaged
2 alpha-BHC	0.02000	0.01844	999600	0.010	7.80259	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01877	1041650	0.010	6.17493	15.00000	Quadratic
6 Heptachlor	1374272	1291200	1291200	0.010	6.04482	15.00000	Averaged
11 Endosulfan I	316531	298450	298450	0.010	5.71231	15.00000	Averaged
13 Dieldrin	1141078	1056575	1056575	0.010	7.40555	15.00000	Averaged
14 Endrin	838667	911100	911100	0.010	-8.63664	15.00000	Averaged
15 4,4'-DDD	841198	797375	797375	0.010	5.20958	15.00000	Averaged
17 4,4'-DDT	1041193	1025400	1025400	0.010	1.51682	15.00000	Averaged
20 Methoxychlor	618692	670130	670130	0.010	-8.31400	15.00000	Averaged
25 Decachlorobiphenyl	1576366	1769750	1769750	0.010	-12.26774	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 23:33  
 Lab File ID: 061.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDA-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
\$ 1 Tetrachloro-m-xylene	1132731	1011800	1011800	0.010	10.67608	15.00000	Averaged
2 alpha-BHC	0.02000	0.01700	913050	0.010	14.98259	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01724	949050	0.010	13.81305	15.00000	Quadratic
6 Heptachlor	1374272	1170350	1170350	0.010	14.83856	15.00000	Averaged
11 Endosulfan I	316531	273550	273550	0.010	13.57883	15.00000	Averaged
13 Dieldrin	1141078	977275	977275	0.010	14.35512	15.00000	Averaged
14 Endrin	838667	786800	786800	0.010	6.18450	15.00000	Averaged
15 4,4'-DDD	841198	728525	728525	0.010	13.39434	15.00000	Averaged
17 4,4'-DDT	1041193	933500	933500	0.010	10.34324	15.00000	Averaged
20 Methoxychlor	618692	617625	617625	0.010	0.17245	15.00000	Averaged
\$ 25 Decachlorobiphenyl	1576366	1544975	1544975	0.010	1.99133	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i      Injection Date: 25-FEB-2008 00:08  
Lab File ID: 062.D      Init. Cal. Date(s): 23-FEB-2008    23-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    15:19      21:35  
Lab Sample ID: INDB-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	REF0.020	CCAL	MIN	MAX		CURVE TYPE
			RRF0.020	RRF	%D / %DRIFT	%D / %DRIFT	
14 beta-BHC	760142	686100	686100	0.010	9.74051	15.00000	Averaged
15 delta-BHC	0.02000	0.01758	860250	0.010	12.10447	15.00000	Quadratic
17 Aldrin	1257075	1096100	1096100	0.010	12.80552	15.00000	Averaged
18 Heptachlor epoxide	1304344	1192150	1192150	0.010	8.60160	15.00000	Averaged
19 gamma-Chlordane	1337463	1207300	1207300	0.010	9.73210	15.00000	Averaged
10 alpha-Chlordane	1330859	1173750	1173750	0.010	11.80508	15.00000	Averaged
12 4,4'-DDE	319942	293825	293825	0.010	8.16315	15.00000	Averaged
16 Endosulfan II	1134606	1058150	1058150	0.010	6.73851	15.00000	Averaged
18 Endrin aldehyde	1006742	973625	973625	0.010	3.28952	15.00000	Averaged
19 Endosulfan sulfate	988557	983800	983800	0.010	0.48124	15.00000	Averaged
21 Endrin ketone	1202170	1203475	1203475	0.010	-0.10857	15.00000	Averaged

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2

ID: 0.53

(mm)

Calibration Time(s): 1519

1810

LAB FILE ID:

RF0.005: 006

RF0.01: 007

RF0.02: 008

RF0.04: 009

RF0.06: 010

RF0.08: 011

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
alpha-BHC	4366	9243	19463	45125	68168	96897
gamma-BHC	4659	9791	20206	45154	67093	94014
Heptachlor	1075800.0	1076200.0	1018500.0	1052350.0	1015966.7	1052237.5
Endosulfan I	245600.00	243300.00	238750.00	248175.00	240500.00	248050.00
Dieldrin	818800.00	828900.00	828575.00	875750.00	846383.33	880200.00
Endrin	555400.00	548800.00	540225.00	567687.50	546191.67	573825.00
4,4'-DDD	597000.00	613300.00	621125.00	653725.00	634558.33	659343.75
4,4'-DDT	711300.00	730350.00	717525.00	734662.50	710008.33	736912.50
Methoxychlor	398160.00	380230.00	348445.00	326115.00	300443.33	306826.25
Tetrachloro-m-xylene	975000.00	961700.00	898100.00	877925.00	815966.67	819412.50
Decachlorobiphenyl	1327300.0	1236550.0	1098100.0	991950.00	897141.67	891937.50

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 1519 1810

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2	MAX %RSD OR R^2
		A0	A1	A2		
alpha-BHC	2ORDR	1.336e-003	9.397e-007	-1.31e-012	0.9994175	0.9900000
gamma-BHC	2ORDR	9.163e-004	9.317e-007	-9.41e-013	0.9994792	0.9900000
Heptachlor	AVRG		1048509.03		2.523	20.000
Endosulfan I	AVRG		244062.500		1.604	20.000
Dieldrin	AVRG		846434.722		3.076	20.000
Endrin	AVRG		555354.861		2.346	20.000
4,4'-DDD	AVRG		629842.014		3.818	20.000
4,4'-DDT	AVRG		723459.722		1.656	20.000
Methoxychlor	AVRG		343369.931		11.548	20.000
Tetrachloro-m-xylene	AVRG		891350.694		7.614	20.000
Decachlorobiphenyl	AVRG		1073829.86		16.779	20.000

FORM VI PEST



FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm) Calibration Time(s): 1844 2135

LAB FILE ID:

RF0.005: 012

RF0.01: 013

RF0.02: 014

RF0.04: 015

RF0.06: 016

RF0.08: 017

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
beta-BHC	774400.00	656400.00	754850.00	674025.00	631650.00	620262.50
delta-BHC	4184	7319	19399	39861	60746	84295
Aldrin	1011600.0	880600.00	1062900.0	1024875.0	1002283.3	1016825.0
Heptachlor epoxide	1078600.0	918000.00	1049200.0	974875.00	934800.00	937175.00
gamma-Chlordane	1127800.0	960600.00	1088500.0	998250.00	953516.67	954600.00
alpha-Chlordane	1235600.0	969100.00	1133650.0	1007350.0	954050.00	952775.00
4,4'-DDE	235800.00	213600.00	270650.00	260587.50	248450.00	250243.75
Endosulfan II	922100.00	784900.00	919400.00	845975.00	799233.33	793168.75
Endrin aldehyde	870700.00	711700.00	804750.00	698562.50	654216.67	640612.50
Endosulfan sulfate	767700.00	648600.00	758975.00	700837.50	663850.00	668818.75
Endrin ketone	962900.00	792950.00	965100.00	868362.50	818233.33	818743.75

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 1844 2135

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2	MAX %RSD OR R^2
		A0	A1	A2		
beta-BHC	AVRG		685264.583		9.423	20.000
delta-BHC	2ORDR	1.459e-003	1.007e-006	-8.66e-013	0.9993746	0.9900000
Aldrin	AVRG		999847.222		6.206	20.000
Heptachlor epoxide	AVRG		982108.333		6.789	20.000
gamma-Chlordane	AVRG		1013877.78		7.484	20.000
alpha-Chlordane	AVRG		1042087.50		11.198	20.000
4,4'-DDE	AVRG		246555.208		8.104	20.000
Endosulfan II	AVRG		844129.514		7.468	20.000
Endrin aldehyde	AVRG		730090.278		12.318	20.000
Endosulfan sulfate	AVRG		701463.542		7.261	20.000
Endrin ketone	AVRG		871048.264		8.730	20.000

FORM VI PEST

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 10:40  
 Lab File ID: 040.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDB-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
4 beta-BHC	685265	712700	712700	0.010	-4.00362	15.00000	Averaged
5 delta-BHC	0.02000	0.01990	930250	0.010	0.50844	15.00000	Quadratic
17 Aldrin	999847	979350	979350	0.010	2.05004	15.00000	Averaged
18 Heptachlor epoxide	982108	1029750	1029750	0.010	-4.85096	15.00000	Averaged
9 gamma-Chlordane	1013878	1023850	1023850	0.010	-0.98357	15.00000	Averaged
10 alpha-Chlordane	1042088	1088450	1088450	0.010	-4.44900	15.00000	Averaged
12 4,4'-DDE	246555	265900	265900	0.010	-7.84603	15.00000	Averaged
16 Endosulfan II	844130	884525	884525	0.010	-4.78546	15.00000	Averaged
18 Endrin aldehyde	730090	791000	791000	0.010	-8.34277	15.00000	Averaged
19 Endosulfan sulfate	701464	771975	771975	0.010	-10.05205	15.00000	Averaged
21 Endrin ketone	871048	976575	976575	0.010	-12.11491	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 11:53  
 Lab File ID: 042.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDA-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
15 1 Tetrachloro-m-xylene	891351	872000	872000	0.010	2.17094	15.00000	Averaged
12 alpha-BHC	0.02000	0.01861	943650	0.010	6.96596	15.00000	Quadratic
13 gamma-BHC	0.02000	0.01890	984600	0.010	5.50485	15.00000	Quadratic
16 Heptachlor	1048509	1000250	1000250	0.010	4.60263	15.00000	Averaged
11 Endosulfan I	244063	230350	230350	0.010	5.61844	15.00000	Averaged
13 Dieldrin	846435	802350	802350	0.010	5.20828	15.00000	Averaged
14 Endrin	555355	590900	590900	0.010	-6.40044	15.00000	Averaged
15 4,4'-DDD	629842	576525	576525	0.010	8.46514	15.00000	Averaged
17 4,4'-DDT	723460	711200	711200	0.010	1.69460	15.00000	Averaged
20 Methoxychlor	343370	379375	379375	0.010	-10.48580	15.00000	Averaged
15 25 Decachlorobiphenyl	1073830	1089975	1089975	0.010	-1.50351	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 23:33  
 Lab File ID: 061.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDA-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1 Tetrachloro-m-xylene	891351	801200	801200	0.010	10.11394	15.00000	Averaged
2 alpha-BHC	0.02000	0.01702	854950	0.010	14.88483	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01710	884300	0.010	14.49731	15.00000	Quadratic
6 Heptachlor	1048509	896700	896700	0.010	14.47856	15.00000	Averaged
11 Endosulfan I	244063	210950	210950	0.010	13.56722	15.00000	Averaged
13 Dieldrin	846435	730575	730575	0.010	13.68797	15.00000	Averaged
14 Endrin	555355	508725	508725	0.010	8.39641	15.00000	Averaged
15 4,4'-DDD	629842	536175	536175	0.010	14.87151	15.00000	Averaged
17 4,4'-DDT	723460	650150	650150	0.010	10.13321	15.00000	Averaged
20 Methoxychlor	343370	350680	350680	0.010	-2.12892	15.00000	Averaged
25 Decachlorobiphenyl	1073830	1034425	1034425	0.010	3.66956	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 25-FEB-2008 00:08  
 Lab File ID: 062.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDB-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
14 beta-BHC	685265	624300	624300	0.010	8.89650	15.00000	Averaged
15 delta-BHC	0.02000	0.01728	796100	0.010	13.61898	15.00000	Quadratic
17 Aldrin	999847	872300	872300	0.010	12.75667	15.00000	Averaged
18 Heptachlor epoxide	982108	898450	898450	0.010	8.51824	15.00000	Averaged
19 gamma-Chlordane	1013878	904200	904200	0.010	10.81765	15.00000	Averaged
10 alpha-Chlordane	1042088	964100	964100	0.010	7.48378	15.00000	Averaged
12 4,4'-DDE	246555	228975	228975	0.010	7.13033	15.00000	Averaged
16 Endosulfan II	844130	779700	779700	0.010	7.63266	15.00000	Averaged
18 Endrin aldehyde	730090	693550	693550	0.010	5.00490	15.00000	Averaged
19 Endosulfan sulfate	701464	689500	689500	0.010	1.70551	15.00000	Averaged
21 Endrin ketone	871048	865125	865125	0.010	0.68002	15.00000	Averaged

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/18/08 02/19/08

Column: RTX-CLP

ID: 0.53

(mm)

Calibration Time(s): 2237

0127

LAB FILE ID:

RF0.005: 018

RF0.01: 019

RF0.02: 020

RF0.04: 021

RF0.06: 022

RF0.08: 023

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
alpha-BHC	3325	6702	13690	34506	60539	84628
gamma-BHC	3517	7064	14335	35421	60524	83906
Heptachlor	889800.00	867800.00	837100.00	951375.00	1027166.7	1042425.0
Endosulfan I	220200.00	213100.00	205950.00	230550.00	245816.67	245087.50
Dieldrin	762600.00	747650.00	748125.00	882350.00	969600.00	979356.25
Endrin	589400.00	573000.00	569550.00	672300.00	734341.67	745962.50
4,4'-DDD	564100.00	556150.00	569450.00	690950.00	754658.33	766931.25
4,4'-DDT	687700.00	677900.00	677950.00	804812.50	853275.00	871275.00
Methoxychlor	521320.00	498440.00	476870.00	512915.00	506420.00	496417.50
Tetrachloro-m-xylene	829800.00	806900.00	770450.00	845600.00	881033.33	863762.50
Decachlorobiphenyl	1371800.0	1280400.0	1201600.0	1239812.5	1222766.7	1171868.8

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/18/08 02/19/08

Column: RTX-CLP

ID: 0.53 (mm)

Calibration Time(s): 2237

0127

COMPOUND	CURVE	COEFFICENTS			%RSD OR R^2	MAX %RSD OR R^2
		A0	A1	A2		
alpha-BHC	2ORDR	2.569e-003	1.169e-006	-3.12e-012	0.9974819	0.9900000
gamma-BHC	2ORDR	2.266e-003	1.146e-006	-2.71e-012	0.9980266	0.9900000
Heptachlor	AVRG		935944.444		9.121	20.000
Endosulfan I	AVRG		226784.028		7.315	20.000
Dieldrin	AVRG		848280.208		12.974	20.000
Endrin	AVRG		647425.694		12.520	20.000
4,4'-DDD	AVRG		650373.264		15.218	20.000
4,4'-DDT	AVRG		762152.083		11.991	20.000
Methoxychlor	AVRG		502063.750		3.069	20.000
Tetrachloro-m-xylene	AVRG		832924.306		4.807	20.000
Decachlorobiphenyl	AVRG		1248041.32		5.669	20.000

FORM VI PEST



FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/19/08 02/19/08

Column: RTX-CLP

ID: 0.53

(mm)

Calibration Time(s): 0202

0452

LAB FILE ID:

RF0.005: 024

RF0.01: 025

RF0.02: 026

RF0.04: 027

RF0.06: 028

RF0.08: 029

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
beta-BHC	525000.00	558400.00	475900.00	637725.00	594933.33	601637.50
delta-BHC	2882	6268	11372	34679	52301	74784
Aldrin	780000.00	832900.00	715150.00	1012800.0	979166.67	1019600.0
Heptachlor epoxide	872600.00	911400.00	771850.00	1027125.0	971583.33	991375.00
gamma-Chlordane	918200.00	960800.00	811500.00	1081450.0	1021350.0	1040025.0
alpha-Chlordane	858000.00	918800.00	789050.00	1075675.0	1026600.0	1044712.5
4,4'-DDE	200000.00	217800.00	190150.00	280162.50	267875.00	272837.50
Endosulfan II	797300.00	823950.00	703050.00	937862.50	900833.33	912125.00
Endrin aldehyde	731300.00	765700.00	663950.00	819737.50	782700.00	765325.00
Endosulfan sulfate	731800.00	768800.00	662400.00	847687.50	814825.00	812375.00
Endrin ketone	847500.00	913150.00	804625.00	1055712.5	1023591.7	1016600.0

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/19/08 02/19/08

Column: RTX-CLP

ID: 0.53 (mm)

Calibration Time(s): 0202

0452

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2	MAX %RSD OR R^2
		A0	A1	A2		
beta-BHC	AVRG		565599.306		10.342	20.000
delta-BHC	2ORDR	3.248e-003	1.189e-006	-2.18e-012	0.9956572	0.9900000
Aldrin	AVRG		889936.111		14.716	20.000
Heptachlor epoxide	AVRG		924322.222		10.078	20.000
gamma-Chlordane	AVRG		972220.833		10.059	20.000
alpha-Chlordane	AVRG		952139.583		12.062	20.000
4,4'-DDE	AVRG		238137.500		16.824	20.000
Endosulfan II	AVRG		845853.472		10.456	20.000
Endrin aldehyde	AVRG		754785.417		7.018	20.000
Endosulfan sulfate	AVRG		772981.250		8.741	20.000
Endrin ketone	AVRG		943529.861		10.991	20.000

FORM VI PEST

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 19-FEB-2008 15:41  
 Lab File ID: 048.D Init. Cal. Date(s): 18-FEB-2008 19-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 21:29 04:52  
 Lab Sample ID: INDA-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080218.b\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRFO.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
\$ 1 Tetrachloro-m-xylene	832924	796600	796600	0.010	4.36106	15.00000	Averaged
2 alpha-BHC	0.02000	0.01864	714450	0.010	6.80834	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01864	740450	0.010	6.82381	15.00000	Quadratic
6 Heptachlor	935944	909600	909600	0.010	2.81474	15.00000	Averaged
11 Endosulfan I	226784	214250	214250	0.010	5.52686	15.00000	Averaged
13 Dieldrin	848280	772725	772725	0.010	8.90687	15.00000	Averaged
14 Endrin	647426	632600	632600	0.010	2.28995	15.00000	Averaged
15 4,4'-DDD	650373	590225	590225	0.010	9.24827	15.00000	Averaged
17 4,4'-DDT	762152	746125	746125	0.010	2.10287	15.00000	Averaged
20 Methoxychlor	502064	519145	519145	0.010	-3.40221	15.00000	Averaged
\$ 25 Decachlorobiphenyl	1248041	1253125	1253125	0.010	-0.40733	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i      Injection Date: 19-FEB-2008 16:15  
Lab File ID: 049.D      Init. Cal. Date(s): 18-FEB-2008    19-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    21:29      04:52  
Lab Sample ID: INDB-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080218.b\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RFO.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
14 beta-BHC	565599	505450	505450	0.010	10.63461	15.00000	Averaged
15 delta-BHC	0.02000	0.01739	608200	0.010	13.07353	15.00000	Quadratic
17 Aldrin	889936	764400	764400	0.010	14.10619	15.00000	Averaged
18 Heptachlor epoxide	924322	825100	825100	0.010	10.73459	15.00000	Averaged
19 gamma-Chlordane	972221	880600	880600	0.010	9.42387	15.00000	Averaged
10 alpha-Chlordane	952140	870350	870350	0.010	8.59008	15.00000	Averaged
12 4,4'-DDE	238138	204925	204925	0.010	13.94677	15.00000	Averaged
16 Endosulfan II	845853	760850	760850	0.010	10.04943	15.00000	Averaged
18 Endrin aldehyde	754785	721100	721100	0.010	4.46291	15.00000	Averaged
19 Endosulfan sulfate	772981	741425	741425	0.010	4.08241	15.00000	Averaged
21 Endrin ketone	943530	906100	906100	0.010	3.96700	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 20-FEB-2008 04:15  
Lab File ID: 070.D Init. Cal. Date(s): 18-FEB-2008 19-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 21:29 04:52  
Lab Sample ID: INDA-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080218.b\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRFO.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1 Tetrachloro-m-xylene	832924	901900	901900	0.010	-8.28115	15.00000	Averaged
2 alpha-BHC	0.02000	0.02075	812550	0.010	-3.72742	15.00000	Quadratic
3 gamma-BHC	0.02000	0.02098	851100	0.010	-4.89625	15.00000	Quadratic
6 Heptachlor	935944	1010000	1010000	0.010	-7.91239	15.00000	Averaged
11 Endosulfan I	226784	239750	239750	0.010	-5.71732	15.00000	Averaged
13 Dieldrin	848280	871725	871725	0.010	-2.76380	15.00000	Averaged
14 Endrin	647426	698350	698350	0.010	-7.86566	15.00000	Averaged
15 4,4'-DDD	650373	668500	668500	0.010	-2.78713	15.00000	Averaged
17 4,4'-DDT	762152	831925	831925	0.010	-9.15472	15.00000	Averaged
20 Methoxychlor	502064	566385	566385	0.010	-12.81137	15.00000	Averaged
25 Decachlorobiphenyl	1248041	1354300	1354300	0.010	-8.51404	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 20-FEB-2008 04:49  
Lab File ID: 071.D Init. Cal. Date(s): 18-FEB-2008 19-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 21:29 04:52  
Lab Sample ID: INDB-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080218.b\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRFO.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
14 beta-BHC	565599	614300	614300	0.010	-8.61046	15.00000	Averaged
15 delta-BHC	0.02000	0.02061	751150	0.010	-3.07219	15.00000	Quadratic
17 Aldrin	889936	929550	929550	0.010	-4.45132	15.00000	Averaged
18 Heptachlor epoxide	924322	992700	992700	0.010	-7.39761	15.00000	Averaged
19 gamma-Chlordane	972221	1046800	1046800	0.010	-7.87673	15.00000	Averaged
10 alpha-Chlordane	952140	1036200	1036200	0.010	-8.82858	15.00000	Averaged
12 4,4'-DDE	238138	247050	247050	0.010	-3.74259	15.00000	Averaged
16 Endosulfan II	845853	900600	900600	0.010	-6.47234	15.00000	Averaged
18 Endrin aldehyde	754785	846800	846800	0.010	-12.19083	15.00000	Averaged
19 Endosulfan sulfate	772981	855100	855100	0.010	-10.62364	15.00000	Averaged
21 Endrin ketone	943530	1048425	1048425	0.010	-11.11731	15.00000	Averaged

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/18/08 02/19/08

Column: RTX-CLP2 ID: 0.53 (mm) Calibration Time(s): 2237 0127

LAB FILE ID: RF0.005: 018 RF0.01: 019 RF0.02: 020  
RF0.04: 021 RF0.06: 022 RF0.08: 023

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
alpha-BHC	3226	6422	13109	32566	54855	74531
gamma-BHC	3449	6791	13703	33004	54185	72708
Heptachlor	814000.00	761800.00	719250.00	790600.00	829516.67	823187.50
Endosulfan I	180000.00	171700.00	164950.00	183925.00	194250.00	192600.00
Dieldrin	625200.00	598350.00	586250.00	669775.00	711858.33	702156.25
Endrin	412500.00	389600.00	377075.00	429012.50	454808.33	453818.75
4,4'-DDD	453200.00	441450.00	436725.00	510875.00	537416.67	532493.75
4,4'-DDT	562900.00	545400.00	523450.00	580800.00	594591.67	593062.50
Methoxychlor	363140.00	327610.00	299800.00	299992.50	287493.33	277025.00
Tetrachloro-m-xylene	753800.00	711700.00	658350.00	682500.00	688933.33	663000.00
Decachlorobiphenyl	1136100.0	998600.00	885750.00	845675.00	806091.67	757968.75

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/18/08 02/19/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 2237 0127

COMPOUND	CURVE	COEFFICENTS			%RSD OR R^2	MAX %RSD OR R^2
		A0	A1	A2		
alpha-BHC	2ORDR	2.428e-003	1.223e-006	-2.59e-012	0.9978191	0.9900000
gamma-BHC	2ORDR	2.058e-003	1.204e-006	-1.95e-012	0.9982385	0.9900000
Heptachlor	AVRG		789725.694		5.384	20.000
Endosulfan I	AVRG		181237.500		6.356	20.000
Dieldrin	AVRG		648931.597		8.235	20.000
Endrin	AVRG		419469.097		7.731	20.000
4,4'-DDD	AVRG		485360.069		9.624	20.000
4,4'-DDT	AVRG		566700.694		4.998	20.000
Methoxychlor	AVRG		309176.806		10.154	20.000
Tetrachloro-m-xylene	AVRG		693047.222		5.111	20.000
Decachlorobiphenyl	AVRG		905030.903		15.426	20.000

FORM VI PEST



FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/19/08 02/19/08

Column: RTX-CLP2 ID: 0.53 (mm) Calibration Time(s): 0202 0452

LAB FILE ID:

RF0.005: 024

RF0.01: 025

RF0.02: 026

RF0.04: 027

RF0.06: 028

RF0.08: 029

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
beta-BHC	518000.00	533200.00	443350.00	557400.00	505333.33	496837.50
delta-BHC	2815	6047	10732	32240	47598	66105
Aldrin	712000.00	730600.00	612850.00	833550.00	786183.33	798575.00
Heptachlor epoxide	744000.00	757200.00	624050.00	804200.00	746533.33	747187.50
gamma-Chlordane	773200.00	782600.00	646400.00	820325.00	758533.33	756675.00
alpha-Chlordane	754000.00	770100.00	646750.00	825350.00	761133.33	758212.50
4,4'-DDE	161700.00	175450.00	155800.00	220737.50	204350.00	203718.75
Endosulfan II	633700.00	662050.00	560200.00	708137.50	658125.00	648625.00
Endrin aldehyde	589900.00	591300.00	496825.00	578912.50	539116.67	518581.25
Endosulfan sulfate	554600.00	562800.00	478750.00	597900.00	562850.00	555518.75
Endrin ketone	657400.00	692250.00	601400.00	751712.50	712725.00	694668.75

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/19/08 02/19/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 0202 0452

COMPOUND	CURVE	COEFFICIENTS			%RSD	MAX %RSD
		A0	A1	A2	OR R^2	OR R^2
beta-BHC	AVRG		509020.139		7.599	20.000
delta-BHC	2ORDR	3.212e-003	1.238e-006	-1.18e-012	0.9953828	0.9900000
Aldrin	AVRG		745626.389		10.588	20.000
Heptachlor epoxide	AVRG		737195.139		8.122	20.000
gamma-Chlordane	AVRG		756288.889		7.746	20.000
alpha-Chlordane	AVRG		752590.972		7.727	20.000
4,4'-DDE	AVRG		186959.375		14.082	20.000
Endosulfan II	AVRG		645139.583		7.524	20.000
Endrin aldehyde	AVRG		552439.236		7.255	20.000
Endosulfan sulfate	AVRG		552069.792		7.120	20.000
Endrin ketone	AVRG		685026.042		7.477	20.000

FORM VI PEST

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 19-FEB-2008 15:41  
 Lab File ID: 048.D Init. Cal. Date(s): 18-FEB-2008 19-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 21:29 04:52  
 Lab Sample ID: INDA-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080218.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRFO.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1 Tetrachloro-m-xylene	693047	679550	679550	0.010	1.94752	15.00000	Averaged
2 alpha-BHC	0.02000	0.01876	687650	0.010	6.19960	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01903	721950	0.010	4.83721	15.00000	Quadratic
6 Heptachlor	789726	752650	752650	0.010	4.69476	15.00000	Averaged
11 Endosulfan I	181238	169050	169050	0.010	6.72460	15.00000	Averaged
13 Dieldrin	648932	606100	606100	0.010	6.60033	15.00000	Averaged
14 Endrin	419469	427825	427825	0.010	-1.99202	15.00000	Averaged
15 4,4'-DDD	485360	464850	464850	0.010	4.22574	15.00000	Averaged
17 4,4'-DDT	566701	549550	549550	0.010	3.02641	15.00000	Averaged
20 Methoxychlor	309177	316860	316860	0.010	-2.48505	15.00000	Averaged
25 Decachlorobiphenyl	905031	906425	906425	0.010	-0.15404	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 19-FEB-2008 16:15  
 Lab File ID: 049.D Init. Cal. Date(s): 18-FEB-2008 19-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 21:29 04:52  
 Lab Sample ID: INDB-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080218.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRFO.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
4 beta-BHC	509020	477650	477650	0.010	6.16285	15.00000	Averaged
5 delta-BHC	0.02000	0.01777	594450	0.010	11.16188	15.00000	Quadratic
7 Aldrin	745626	671350	671350	0.010	9.96161	15.00000	Averaged
8 Heptachlor epoxide	737195	670350	670350	0.010	9.06750	15.00000	Averaged
9 gamma-Chlordane	756289	690800	690800	0.010	8.65924	15.00000	Averaged
10 alpha-Chlordane	752591	694950	694950	0.010	7.65900	15.00000	Averaged
12 4,4'-DDE	186959	168625	168625	0.010	9.80661	15.00000	Averaged
16 Endosulfan II	645140	616800	616800	0.010	4.39278	15.00000	Averaged
18 Endrin aldehyde	552439	535850	535850	0.010	3.00291	15.00000	Averaged
19 Endosulfan sulfate	552070	534025	534025	0.010	3.26857	15.00000	Averaged
21 Endrin ketone	685026	671600	671600	0.010	1.95993	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 20-FEB-2008 04:15  
 Lab File ID: 070.D Init. Cal. Date(s): 18-FEB-2008 19-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 21:29 04:52  
 Lab Sample ID: INDA-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080218.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRFO.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1 Tetrachloro-m-xylene	693047	770700	770700	0.010	-11.20454	15.00000	Averaged
2 alpha-BHC	0.02000	0.02141	803250	0.010	-7.04786	15.00000	Quadratic
3 gamma-BHC	0.02000	0.02170	838800	0.010	-8.51740	15.00000	Quadratic
6 Heptachlor	789726	865400	865400	0.010	-9.58235	15.00000	Averaged
11 Endosulfan I	181238	194050	194050	0.010	-7.06945	15.00000	Averaged
13 Dieldrin	648932	694350	694350	0.010	-6.99895	15.00000	Averaged
14 Endrin	419469	448075	448075	0.010	-6.81955	15.00000	Averaged
15 4,4'-DDD	485360	489925	489925	0.010	-0.94052	15.00000	Averaged
17 4,4'-DDT	566701	630850	630850	0.010	-11.31979	15.00000	Averaged
20 Methoxychlor	309177	348085	348085	0.010	-12.58445	15.00000	Averaged
25 Decachlorobiphenyl	905031	981225	981225	0.010	-8.41895	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 20-FEB-2008 04:49  
 Lab File ID: 071.D Init. Cal. Date(s): 18-FEB-2008 19-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 21:29 04:52  
 Lab Sample ID: INDB-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080218.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF %D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
4 beta-BHC	509020	580900	580900	0.010 -14.12122	15.00000	Averaged
5 delta-BHC	0.02000	0.02143	746350	0.010 -7.16663	15.00000	Quadratic
7 Aldrin	745626	815400	815400	0.010 -9.35772	15.00000	Averaged
8 Heptachlor epoxide	737195	807200	807200	0.010 -9.49611	15.00000	Averaged
9 gamma-Chlordane	756289	833250	833250	0.010 -10.17615	15.00000	Averaged
10 alpha-Chlordane	752591	823750	823750	0.010 -9.45521	15.00000	Averaged
12 4,4'-DDE	186959	205325	205325	0.010 -9.82332	15.00000	Averaged
16 Endosulfan II	645140	737175	737175	0.010 -14.26597	15.00000	Averaged
18 Endrin aldehyde	552439	626775	626775	0.010 -13.45592	15.00000	Averaged
19 Endosulfan sulfate	552070	632650	632650	0.010 -14.59602	15.00000	Averaged
21 Endrin ketone	685026	776975	776975	0.010 -13.42270	15.00000	Averaged

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP

ID: 0.50

(mm)

Calibration Time(s): 1704

2048

LAB FILE ID:

RF0.02: 006

RF0.04: 007

RF0.08: 008

RF0.2: 009

RF0.5: 010

RF0.7: 011

COMPOUND	RF0.02	RF0.04	RF0.08	RF0.2	RF0.5	RF0.7
=====	=====	=====	=====	=====	=====	=====
2,4-DB	5108	9719	18353	41322	87879	118108
Dicamba	12307	22969	42954	95072	203285	268904
Dichlorprop	9154	16682	30960	65694	134828	175040
Dalapon	6745	11203	19791	42458	87260	110919
Dinoseb	5342	11986	42389	58458	126744	188628
MCPA	12002	18958	30045	52002	92400	114748
MCPP	6640	11132	18174	32745	58460	72824
2,4,5-TP (Silvex)	7923	14045	28145	67736	154903	206955
2,4,5-T	7840	14982	30069	70942	158635	210003
2,4-D	10207	18232	33189	70147	141447	183884
=====	=====	=====	=====	=====	=====	=====
DCAA	9088	16340	28995	60056	121328	157601
=====	=====	=====	=====	=====	=====	=====

FORM VI HERB

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP

ID: 0.50 (mm)

Calibration Time(s): 1704

2048

RF1: 012

COMPOUND	RF1	CURVE	COEFFICIENTS			%RSD OR R^2	MA
			A0	A1	A2		
=====	=====	=====	=====	=====	=====	=====	==
2,4-DB	157499	2ORDR	-9.04e-003	4.822e-006	1.01e-011	0.9998403	0
Dicamba	356790	2ORDR	-4.28e-003	1.013e-006	1.126e-012	0.9999391	0
Dichlorprop	228577	2ORDR	-9.79e-003	2.795e-006	7.136e-012	0.9999235	C
Dalapon	147393	2ORDR	-7.33e-003	2.268e-006	8.085e-012	0.9996880	C
Dinoseb	271766	2ORDR	-6.2e-003	9.93e-007	-1.68e-013	0.9932724	C
MCPA	141799	2ORDR	-1.9041304	2.504e-004	3.303e-009	0.9998884	C
MCPP	91657	2ORDR	-2.0604654	4.603e-004	7.178e-009	0.9997430	C
2,4,5-TP (Silvex)	266465	2ORDR	1.51e-003	6.045e-007	1.208e-012	0.9996141	C
2,4,5-T	281777	2ORDR	-4.61e-004	6.635e-007	8.038e-013	0.9999780	C
2,4-D	244226	2ORDR	-1.61e-002	2.855e-006	5.423e-012	0.9996761	C
=====	=====	=====	=====	=====	=====	=====	==
DCAA	206190	2ORDR	-1.48e-002	3.168e-006	8.563e-012	0.9998612	C

FORM VI HERB



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 24-FEB-2008 10:49  
 Lab File ID: 042.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1\$ 2 DCAA	0.50000	0.53731	258336	0.001	-7.46261	15.00000	Quadratic
11 Dalapon	0.25000	0.27749	376236	0.001	-10.99699	15.00000	Quadratic
13 Dicamba	0.25000	0.26678	863052	0.001	-6.71144	15.00000	Quadratic
14 MCPP	50.00000	51.71683	1205	0.001	-3.43365	15.00000	Quadratic
15 MCPA	50.00000	51.20469	1889	0.001	-2.40938	15.00000	Quadratic
16 Dichlorprop	0.50000	0.52565	281796	0.001	-5.12902	15.00000	Quadratic
17 2,4-D	0.50000	0.51129	289722	0.001	-2.25873	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.13289	1309888	0.001	-6.30811	15.00000	Quadratic
110 2,4,5-T	0.12500	0.12678	1284320	0.001	-1.42146	15.00000	Quadratic
111 2,4-DB	0.50000	0.48285	172760	0.001	3.42934	15.00000	Quadratic
112 Dinoseb	0.12500	0.13366	1154928	0.001	-6.92564	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 24-FEB-2008 22:14  
 Lab File ID: 060.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	CCAL RRF0.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1\$ 2 DCAA	0.50000	0.50678	246880	0.001	-1.35502	15.00000	Quadratic
11 Dalapon	0.25000	0.25245	349412	0.001	-0.97995	15.00000	Quadratic
13 Dicamba	0.25000	0.24917	815640	0.001	0.33341	15.00000	Quadratic
14 MCPP	50.00000	50.52478	1187	0.001	-1.04956	15.00000	Quadratic
15 MCPA	50.00000	45.15155	1747	0.001	9.69690	15.00000	Quadratic
16 Dichlorprop	0.50000	0.50502	273156	0.001	-1.00361	15.00000	Quadratic
17 2,4-D	0.50000	0.53555	300610	0.001	-7.11041	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12710	1263288	0.001	-1.67989	15.00000	Quadratic
110 2,4,5-T	0.12500	0.12805	1295360	0.001	-2.44012	15.00000	Quadratic
111 2,4-DB	0.50000	0.50456	179338	0.001	-0.91216	15.00000	Quadratic
112 Dinoseb	0.12500	0.12716	1099960	0.001	-1.72761	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 25-FEB-2008 03:48  
 Lab File ID: 069.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1\$ 2 DCAA	0.50000	0.50051	244504	0.001	-0.10237	15.00000	Quadratic
11 Dalapon	0.25000	0.24676	343204	0.001	1.29689	15.00000	Quadratic
13 Dicamba	0.25000	0.24613	807376	0.001	1.54838	15.00000	Quadratic
14 MCPP	50.00000	50.05595	1180	0.001	-0.11190	15.00000	Quadratic
15 MCPA	50.00000	44.58560	1733	0.001	10.82879	15.00000	Quadratic
16 Dichlorprop	0.50000	0.49980	270952	0.001	0.04022	15.00000	Quadratic
17 2,4-D	0.50000	0.53677	301152	0.001	-7.35360	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12556	1250768	0.001	-0.44762	15.00000	Quadratic
110 2,4,5-T	0.12500	0.12695	1285800	0.001	-1.55788	15.00000	Quadratic
111 2,4-DB	0.50000	0.50242	178692	0.001	-0.48386	15.00000	Quadratic
112 Dinoseb	0.12500	0.12606	1090704	0.001	-0.85107	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 26-FEB-2008 08:37  
 Lab File ID: 073.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	CCAL RRF0.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
9 2 DCAA	0.50000	0.55554	265074	0.001	-11.10735	15.00000	Quadratic
11 Dalapon	0.25000	0.28400	383084	0.001	-13.60089	15.00000	Quadratic
13 Dicamba	0.25000	0.27260	878536	0.001	-9.03960	15.00000	Quadratic
14 MCPP	50.00000	53.68835	1234	0.001	-7.37670	15.00000	Quadratic
15 MCPA	50.00000	51.36391	1893	0.001	-2.72783	15.00000	Quadratic
16 Dichlorprop	0.50000	0.54634	290356	0.001	-9.26877	15.00000	Quadratic
17 2,4-D	0.50000	0.54601	305262	0.001	-9.20294	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.13854	1354808	0.001	-10.83156	15.00000	Quadratic
110 2,4,5-T	0.12500	0.13688	1371176	0.001	-9.50187	15.00000	Quadratic
111 2,4-DB	0.50000	0.52682	186014	0.001	-5.36301	15.00000	Quadratic
112 Dinoseb	0.12500	0.13985	1207408	0.001	-11.87655	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 26-FEB-2008 11:21  
 Lab File ID: 077.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
18 2 DCAA	0.50000	0.52550	253930	0.001	-5.10032	15.00000	Quadratic
11 Dalapon	0.25000	0.27362	372140	0.001	-9.44858	15.00000	Quadratic
13 Dicamba	0.25000	0.25620	834684	0.001	-2.48109	15.00000	Quadratic
14 MCPP	50.00000	49.41464	1170	0.001	1.17072	15.00000	Quadratic
15 MCPA	50.00000	44.62263	1734	0.001	10.75473	15.00000	Quadratic
16 Dichlorprop	0.50000	0.50196	271866	0.001	-0.39223	15.00000	Quadratic
17 2,4-D	0.50000	0.51874	293078	0.001	-3.74731	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12844	1274112	0.001	-2.74906	15.00000	Quadratic
110 2,4,5-T	0.12500	0.12864	1300480	0.001	-2.91338	15.00000	Quadratic
111 2,4-DB	0.50000	0.48669	173928	0.001	2.66165	15.00000	Quadratic
112 Dinoseb	0.12500	0.12678	1096712	0.001	-1.42007	15.00000	Quadratic

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP2 ID: 0.42 (mm) Calibration Time(s): 1704 2048

LAB FILE ID: RF0.02: 006

RF0.04: 007

RF0.08: 008

RF0.2: 009

RF0.5: 010

RF0.7: 011

COMPOUND	RF0.02	RF0.04	RF0.08	RF0.2	RF0.5	RF0.7
=====	=====	=====	=====	=====	=====	=====
2,4-DB	4429	8316	15774	36286	80830	109256
Dicamba	9653	18320	36038	85536	195927	266691
Dichlorprop	8187	14910	28154	62007	133922	177222
Dalapon	4566	9433	16118	36897	81288	104733
Dinoseb	2094	7777	16880	46589	110909	159057
MCPA	10749	16922	27448	49512	89522	112269
MCPP	6622	10361	17168	31016	55789	70470
2,4,5-TP (Silvex)	5684	11127	23049	59599	147258	203220
2,4,5-T	6330	12148	24753	61099	146782	200264
2,4-D	13150	23359	43061	93050	201157	267861
=====	=====	=====	=====	=====	=====	=====
DCAA	7653	14328	26178	55097	116119	154115
=====	=====	=====	=====	=====	=====	=====

FORM VI HERB

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP2 ID: 0.42 (mm)

Calibration Time(s): 1704 2048

RF1: 012

COMPOUND	RF1	CURVE	COEFFICENTS			%RSD OR R^2	MA
			A0	A1	A2		
2,4-DB	149047	2ORDR	-8.53e-003	5.629e-006	7.697e-012	0.9999219	0
Dicamba	364266	2ORDR	-2.05e-003	1.163e-006	5.934e-013	0.9999696	0
Dichlorprop	236311	2ORDR	-9.11e-003	3.138e-006	4.815e-012	0.9999453	0
Dalapon	143839	2ORDR	-5.61e-003	2.749e-006	5.455e-012	0.9995201	0
Dinoseb	223767	2ORDR	1.848e-003	1.069e-006	1.739e-013	0.9997660	0
MCPA	142230	2ORDR	-2.6028993	3.368e-004	2.724e-009	0.9997388	0
MCPP	89670	2ORDR	-2.8035158	5.661e-004	6.533e-009	0.9995755	0
2,4,5-TP (Silvex)	281496	2ORDR	1.113e-003	7.94e-007	3.171e-013	0.9999785	0
2,4,5-T	273205	2ORDR	5.073e-004	7.71e-007	5.169e-013	0.9999833	0
2,4-D	355303	2ORDR	-1.07e-002	2.093e-006	2.116e-012	0.9999484	0
DCAA	206441	2ORDR	-1.55e-002	3.715e-006	5.894e-012	0.9998071	0

FORM VI HERB

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 24-FEB-2008 10:49  
 Lab File ID: 042.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRF0.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1\$ 2 DCAA	0.50000	0.50662	236670	0.001	-1.32485	15.00000	Quadratic
1 Dalapon	0.25000	0.26306	335176	0.001	-5.22292	15.00000	Quadratic
13 Dicamba	0.25000	0.25417	799872	0.001	-1.66928	15.00000	Quadratic
14 MCPP	50.00000	47.66807	1093	0.001	4.66385	15.00000	Quadratic
15 MCPA	50.00000	51.24477	1835	0.001	-2.48954	15.00000	Quadratic
16 Dichlorprop	0.50000	0.50458	271014	0.001	-0.91575	15.00000	Quadratic
17 2,4-D	0.50000	0.47952	391116	0.001	4.09563	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12382	1168224	0.001	0.94184	15.00000	Quadratic
10 2,4,5-T	0.12500	0.11865	1120576	0.001	5.08372	15.00000	Quadratic
11 2,4-DB	0.50000	0.49537	161254	0.001	0.92692	15.00000	Quadratic
12 Dinoseb	0.12500	0.13953	1009328	0.001	-11.62198	15.00000	Quadratic



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i      Injection Date: 24-FEB-2008 22:14  
Lab File ID: 060.D      Init. Cal. Date(s): 18-NOV-2003      21-FEB-2008  
Analysis Type: WATER      Init. Cal. Times: 10:47      20:48  
Lab Sample ID: HSTD-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	MAX %D / %DRIFT	CURVE TYPE
2 DCAA	0.50000	0.51087	238330	0.001	-2.17386	15.00000 Quadratic
1 Dalapon	0.25000	0.26458	336836	0.001	-5.83142	15.00000 Quadratic
3 Dicamba	0.25000	0.25506	802416	0.001	-2.02553	15.00000 Quadratic
4 MCPP	50.00000	50.63049	1139	0.001	-1.26098	15.00000 Quadratic
5 MCPA	50.00000	50.03380	1806	0.001	-0.06760	15.00000 Quadratic
6 Dichlorprop	0.50000	0.51422	275344	0.001	-2.84426	15.00000 Quadratic
7 2,4-D	0.50000	0.51958	418276	0.001	-3.91509	15.00000 Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12956	1219832	0.001	-3.64438	15.00000 Quadratic
10 2,4,5-T	0.12500	0.13334	1247760	0.001	-6.66846	15.00000 Quadratic
11 2,4-DB	0.50000	0.51984	168350	0.001	-3.96764	15.00000 Quadratic
12 Dinoseb	0.12500	0.13986	1011744	0.001	-11.89094	15.00000 Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 25-FEB-2008 03:48  
 Lab File ID: 069.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
19 2 DCAA	0.50000	0.50723	236906	0.001	-1.44545	15.00000	Quadratic
1 Dalapon	0.25000	0.25955	331336	0.001	-3.81819	15.00000	Quadratic
13 Dicamba	0.25000	0.25329	797344	0.001	-1.31546	15.00000	Quadratic
14 MCPP	50.00000	50.43933	1136	0.001	-0.87866	15.00000	Quadratic
15 MCEA	50.00000	48.48593	1769	0.001	3.02814	15.00000	Quadratic
16 Dichlorprop	0.50000	0.50973	273328	0.001	-1.94524	15.00000	Quadratic
17 2,4-D	0.50000	0.51858	417610	0.001	-3.71679	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12883	1213336	0.001	-3.06594	15.00000	Quadratic
10 2,4,5-T	0.12500	0.13288	1243840	0.001	-6.30311	15.00000	Quadratic
11 2,4-DB	0.50000	0.51513	166990	0.001	-3.02656	15.00000	Quadratic
12 Dinoseb	0.12500	0.13905	1005904	0.001	-11.24085	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 26-FEB-2008 08:37  
 Lab File ID: 073.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1\$ 2 DCAA	0.50000	0.51011	238032	0.001	-2.02133	15.00000	Quadratic
1 Dalapon	0.25000	0.26716	339644	0.001	-6.86244	15.00000	Quadratic
13 Dicamba	0.25000	0.25492	802008	0.001	-1.96839	15.00000	Quadratic
14 MCPP	50.00000	46.82714	1080	0.001	6.34573	15.00000	Quadratic
15 MCPA	50.00000	55.40108	1933	0.001	-10.80216	15.00000	Quadratic
16 Dichlorprop	0.50000	0.51088	273848	0.001	-2.17695	15.00000	Quadratic
17 2,4-D	0.50000	0.49706	403076	0.001	0.58731	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12767	1202904	0.001	-2.13772	15.00000	Quadratic
110 2,4,5-T	0.12500	0.12640	1187960	0.001	-1.11672	15.00000	Quadratic
111 2,4-DB	0.50000	0.49605	161454	0.001	0.78950	15.00000	Quadratic
112 Dinoseb	0.12500	0.14025	1014512	0.001	-12.19912	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 26-FEB-2008 11:21  
 Lab File ID: 077.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1\$ 2 DCAA	0.50000	0.51109	238418	0.001	-2.21891	15.00000	Quadratic
11 Dalapon	0.25000	0.26745	339960	0.001	-6.97860	15.00000	Quadratic
13 Dicamba	0.25000	0.25427	800152	0.001	-1.70848	15.00000	Quadratic
14 MCPP	50.00000	49.40591	1120	0.001	1.18818	15.00000	Quadratic
15 MCPA	50.00000	52.36002	1862	0.001	-4.72004	15.00000	Quadratic
16 Dichlorprop	0.50000	0.51000	273452	0.001	-2.00048	15.00000	Quadratic
17 2,4-D	0.50000	0.50608	409186	0.001	-1.21666	15.00000	Quadratic
19 2,4,5-TP (Silvex)	0.12500	0.12737	1200144	0.001	-1.89229	15.00000	Quadratic
110 2,4,5-T	0.12500	0.12858	1206872	0.001	-2.86749	15.00000	Quadratic
111 2,4-DB	0.50000	0.51083	165744	0.001	-2.16561	15.00000	Quadratic
112 Dinoseb	0.12500	0.14079	1018376	0.001	-12.62938	15.00000	Quadratic

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/20/08 02/20/08

Column: RTX-CLP

ID: 0.50

(mm)

Calibration Time(s): 1005

1423

LAB FILE ID:

RF0.02: 003

RF0.04: 004

RF0.08: 005

RF0.2: 006

RF0.5: 007

RF0.7: 008

COMPOUND	RF0.02	RF0.04	RF0.08	RF0.2	RF0.5	RF0.7
=====	=====	=====	=====	=====	=====	=====
2,4-DB	4344	8794	17462	40716	85133	117009
Dicamba	14158	26572	48515	105917	216597	285822
Dichlorprop	9941	18537	34113	72266	142847	185141
Dalapon	9008	14494	25127	49455	98192	124800
Dinoseb	9834	16257	47681	71116	148345	211119
MCPA	13177	21281	33318	59372	104287	126785
MCPP	5007	9586	16333	31407	57471	72830
2,4,5-TP (Silvex)	8334	15490	30193	73789	164438	216217
2,4,5-T	8092	15813	31498	75315	160991	216423
2,4-D	9175	17602	32253	68992	137373	181040
=====	=====	=====	=====	=====	=====	=====
DCAA	9955	18097	31804	64953	126708	165512

FORM VI HERB

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/20/08 02/20/08

Column: RTX-CLP ID: 0.50 (mm)

Calibration Time(s): 1005 1423

RF1: 009

COMPOUND	RF1	CURVE	COEFFICIENTS			%RSD OR R^2	MA
			A0	A1	A2		
=====	=====	=====	=====	=====	=====	=====	=====
2,4-DB	157965	2ORDR	-8.69e-003	5.157e-006	7.844e-012	0.9994985	0
Dicamba	379173	2ORDR	-6.45e-003	9.421e-007	1.048e-012	0.9997568	0
Dichlorprop	242102	2ORDR	-1.23e-002	2.604e-006	6.579e-012	0.9997327	0
Dalapon	163082	2ORDR	-1.03e-002	1.912e-006	7.54e-012	0.9998022	0
Dinoseb	297176	2ORDR	-8.01e-003	8.385e-007	1.168e-013	0.9956516	0
MCPA	157684	2ORDR	-1.4641196	1.98e-004	2.84e-009	0.9998902	0
MCPP	93312	2ORDR	-1.8193174	5.482e-004	5.886e-009	0.9994967	0
2,4,5-TP (Silvex)	291194	2ORDR	-4.03e-004	6.408e-007	7.589e-013	0.9999323	0
2,4,5-T	292182	2ORDR	-1.37e-003	6.684e-007	6.642e-013	0.9997782	0
2,4-D	240643	2ORDR	-1.58e-002	2.967e-006	5.292e-012	0.9995202	0
=====	=====	=====	=====	=====	=====	=====	=====
DCAA	217306	2ORDR	-1.97e-002	3.084e-006	7.489e-012	0.9995797	0

FORM VI HERB

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i                      Injection Date: 20-FEB-2008 22:27  
Lab File ID: 022.D                         Init. Cal. Date(s): 18-NOV-2003    20-FEB-2008  
Analysis Type: WATER                      Init. Cal. Times:    10:47                      14:23  
Lab Sample ID: HSTD-CCV                   Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-5.i\080220.b\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
\$ 2 DCAA	0.50000	0.46425	242456	0.001	7.14927	15.00000	Quadratic
1 Dalapon	0.25000	0.21413	349196	0.001	14.34901	15.00000	Quadratic
3 Dicamba	0.25000	0.22572	805328	0.001	9.71137	15.00000	Quadratic
4 MCPP	50.00000	48.52315	1140	0.001	2.95371	15.00000	Quadratic
5 MCPA	50.00000	43.68319	1919	0.001	12.63362	15.00000	Quadratic
6 Dichlorprop	0.50000	0.47478	277088	0.001	5.04378	15.00000	Quadratic
7 2,4-D	0.50000	0.53877	295836	0.001	-7.75424	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.11636	1232744	0.001	6.91301	15.00000	Quadratic
10 2,4,5-T	0.12500	0.12333	1286832	0.001	1.33745	15.00000	Quadratic
11 2,4-DB	0.50000	0.52198	180924	0.001	-4.39605	15.00000	Quadratic
12 Dinoseb	0.12500	0.11028	1107208	0.001	11.77950	15.00000	Quadratic

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/20/08 02/20/08

Column: RTX-CLP2 ID: 0.42 (mm)

Calibration Time(s): 1005

1423

LAB FILE ID:

RF0.02: 003

RF0.04: 004

RF0.08: 005

RF0.2: 006

RF0.5: 007

RF0.7: 008

COMPOUND	RF0.02	RF0.04	RF0.08	RF0.2	RF0.5	RF0.7
=====	=====	=====	=====	=====	=====	=====
2,4-DB	4016	7784	15499	35531	77379	106054
Dicamba	9936	18717	36516	85451	192243	263076
Dichlorprop	8169	15130	28177	61789	131162	174820
Dalapon	5096	9331	17860	38286	82435	108606
Dinoseb	5522	10867	21797	53694	123293	168749
MCPA	10631	17155	28647	52473	94412	118102
MCPP	5120	8530	14595	27486	50185	64575
2,4,5-TP (Silvex)	5703	11260	23197	59713	143122	200345
2,4,5-T	5780	11595	24240	59535	139308	194480
2,4-D	12184	22631	41664	90712	192536	258807
=====	=====	=====	=====	=====	=====	=====
DCAA	8314	14719	26565	55609	113752	152331

FORM VI HERB



FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/20/08 02/20/08

Column: RTX-CLP2 ID: 0.42 (mm)

Calibration Time(s): 1005 1423

RF1: 009

COMPOUND	RF1	CURVE	COEFFICIENTS			%RSD OR R^2	MA
			A0	A1	A2		
2,4-DB	145508	2ORDR	-9.63e-003	5.958e-006	6.833e-012	0.9997271	0
Dicamba	361927	2ORDR	-3.74e-003	1.211e-006	5.046e-013	0.9998970	0
Dichlorprop	234933	2ORDR	-1.26e-002	3.304e-006	4.327e-012	0.9998291	0
Dalapon	145303	2ORDR	-5.42e-003	2.568e-006	6.32e-012	0.9998980	0
Dinoseb	232858	2ORDR	-6.58e-004	9.395e-007	5.929e-013	0.9999376	0
MCPA	149872	2ORDR	-2.2566477	3.105e-004	2.504e-009	0.9996617	0
MCPP	85895	2ORDR	-3.6758722	8.118e-004	4.732e-009	0.9985364	0
2,4,5-TP (Silvex)	279320	2ORDR	3.67e-004	8.315e-007	2.206e-013	0.9999505	0
2,4,5-T	269859	2ORDR	-3.2e-004	8.482e-007	2.933e-013	0.9999131	0
2,4-D	352273	2ORDR	-1.6e-002	2.359e-006	1.516e-012	0.9997193	0
DCAA	204378	2ORDR	-2.02e-002	3.857e-006	5.624e-012	0.9996203	0

FORM VI HERB

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i      Injection Date: 20-FEB-2008 22:27  
Lab File ID: 022.D      Init. Cal. Date(s): 18-NOV-2003      20-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:      10:47      14:23  
Lab Sample ID: HSTD-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-5.i\080220.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	CCAL RRF0.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
2 DCAA	0.50000	0.50748	233784	0.001	-1.49512	15.00000	Quadratic
1 Dalapon	0.25000	0.24832	328736	0.001	0.67013	15.00000	Quadratic
3 Dicamba	0.25000	0.25234	782196	0.001	-0.93429	15.00000	Quadratic
4 MCPP	50.00000	53.94852	1080	0.001	-7.89705	15.00000	Quadratic
5 MCPA	50.00000	43.77933	1742	0.001	12.44134	15.00000	Quadratic
6 Dichlorprop	0.50000	0.50663	267462	0.001	-1.32602	15.00000	Quadratic
7 2,4-D	0.50000	0.52414	405204	0.001	-4.82882	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12837	1184976	0.001	-2.69900	15.00000	Quadratic
10 2,4,5-T	0.12500	0.13351	1199960	0.001	-6.80781	15.00000	Quadratic
11 2,4-DB	0.50000	0.53161	165902	0.001	-6.32221	15.00000	Quadratic
12 Dinoseb	0.12500	0.12887	1020728	0.001	-3.09549	15.00000	Quadratic

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjjuarez  
 Curve Type : Average

## Calibration File Names:

Level 1: \\Nitro\chem\ECD-7.i\080225.b\008.D  
 Level 2: \\Nitro\chem\ECD-7.i\080225.b\009.D  
 Level 3: \\Nitro\chem\ECD-7.i\080225.b\010.D  
 Level 4: \\Nitro\chem\ECD-7.i\080225.b\011.D  
 Level 5: \\Nitro\chem\ECD-7.i\080225.b\012.D  
 Level 6: \\Nitro\chem\ECD-7.i\080225.b\013.D

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD
Level 1	Level 2	Level 3	Level 4	Level 5	Level 6			
24 Aroclor-1016(1)	158840	159210	146484	133258	127241	123063	141349	11.187
(2)	310860	291860	260992	235770	224535	216610	256771	14.848
(3)	408820	386270	334092	310422	300047	292621	338712	14.231
(4)	293400	278730	252684	230108	219207	211584	247619	13.396
(5)	229680	214740	190444	172898	163516	156677	187993	15.539
25 Aroclor-1221(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
26 Aroclor-1232(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
27 Aroclor-1242(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
28 Aroclor-1248(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
29 Aroclor-1254(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuares  
 Curve Type : Average

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
	Level 1	Level 2	Level 3	Level 4	Level 5	Level 6			
-----	-----	-----	-----	-----	-----	-----	-----	-----	-----
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
30 Aroclor-1260(1)	435960	398870	352160	317264	304503	297008	350961	15.980	
(2)	662140	594040	528220	479210	464583	454213	530401	15.585	
(3)	338000	311930	278716	250210	239115	233383	275226	15.399	
(4)	393520	363710	328700	295740	284957	280092	324453	14.246	
(5)	800000	720480	655308	600802	587904	582351	657808	13.250	
41 Aroclor-1268(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
-----	-----	-----	-----	-----	-----	-----	-----	-----	-----
\$ 1 Tetrachloro-m-Xylene	8170200	7632900	7121200	6786120	6713173	6662370	7180994	8.425	
\$ 33 Decachlorobiphenyl (DCB)	7602000	6638300	6236720	5612620	5363707	5408550	6143649	14.210	

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i Injection Date: 26-FEB-2008 09:15  
 Lab File ID: 034.D Init. Cal. Date(s): 25-FEB-2008 25-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 18:27 21:18  
 Lab Sample ID: AR1660-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m

COMPOUND	RRF / AMOUNT	REF. 500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
\$ 1 Tetrachloro-m-Xylene	7180994	7034200	0.010	2.04420	15.00000	Averaged
24 Aroclor-1016(1)	141349	147488	0.010	-4.34286	15.00000	Averaged
(2)	256771	263304	0.010	-2.54425	15.00000	Averaged
(3)	338712	341120	0.010	-0.71094	15.00000	Averaged
(4)	247619	250792	0.010	-1.28149	15.00000	Averaged
(5)	187993	189168	0.010	-0.62529	15.00000	Averaged
30 Aroclor-1260(1)	350961	352584	0.010	-0.46251	15.00000	Averaged
(2)	530401	525912	0.010	0.84633	15.00000	Averaged
(3)	275226	279064	0.010	-1.39463	15.00000	Averaged
(4)	324453	329316	0.010	-1.49876	15.00000	Averaged
(5)	657808	654848	0.010	0.44990	15.00000	Averaged
\$ 33 Decachlorobiphenyl (DCB)	6143649	6148040	0.010	-0.07146	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i      Injection Date: 26-FEB-2008 20:03  
Lab File ID: 053.D      Init. Cal. Date(s): 25-FEB-2008    25-FEB-2008  
Analysis Type: WATER      Init. Cal. Times: 18:27      21:18  
Lab Sample ID: AR1660-CCV    Quant Type: ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m

COMPOUND	RRF / AMOUNT	RFO.500	MIN		MAX		CURVE TYPE
			RRF	%D / %DRIFT	%D / %DRIFT		
\$ 1 Tetrachloro-m-Xylene	7180994	7195880	0.010	-0.20730	15.00000		Averaged
24 Aroclor-1016(1)	141349	149932	0.010	-6.07191	15.00000		Averaged
(2)	256771	267300	0.010	-4.10050	15.00000		Averaged
(3)	338712	341460	0.010	-0.81133	15.00000		Averaged
(4)	247619	252168	0.010	-1.83719	15.00000		Averaged
(5)	187993	192216	0.010	-2.24663	15.00000		Averaged
30 Aroclor-1260(1)	350961	361564	0.010	-3.02120	15.00000		Averaged
(2)	530401	539064	0.010	-1.63330	15.00000		Averaged
(3)	275226	286664	0.010	-4.15600	15.00000		Averaged
(4)	324453	336916	0.010	-3.84116	15.00000		Averaged
(5)	657808	671424	0.010	-2.06998	15.00000		Averaged
\$ 33 Decachlorobiphenyl (DCB)	6143649	6398480	0.010	-4.14787	15.00000		Averaged

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuarez  
 Curve Type : Average

## Calibration File Names:

Level 1: \\Nitro\chem\ECD-7.i\080225.b\080225.b\008.D  
 Level 2: \\Nitro\chem\ECD-7.i\080225.b\080225.b\009.D  
 Level 3: \\Nitro\chem\ECD-7.i\080225.b\080225.b\010.D  
 Level 4: \\Nitro\chem\ECD-7.i\080225.b\080225.b\011.D  
 Level 5: \\Nitro\chem\ECD-7.i\080225.b\080225.b\012.D  
 Level 6: \\Nitro\chem\ECD-7.i\080225.b\080225.b\013.D

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
-----	-----	-----	-----	-----	-----	-----	-----	-----	
24 Aroclor-1016(1)	188840	173810	160312	151714	148364	143570	161102	10.713	
(2)	389440	365910	331688	304708	293963	285983	328615	12.686	
(3)	495640	471650	418528	394776	391996	380247	425473	11.130	
(4)	346180	342590	296512	269896	259909	257690	295463	13.655	
(5)	279820	264950	236324	218764	210175	204070	235684	13.066	
25 Aroclor-1221(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
26 Aroclor-1232(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
27 Aroclor-1242(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
28 Aroclor-1248(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
29 Aroclor-1254(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuarez  
 Curve Type : Average

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
Level 1	Level 2	Level 3	Level 4	Level 5	Level 6				
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
30 Aroclor-1260(1)	567080	523680	461776	423508	411521	399843	464568	14.504	
(2)	664040	607800	538796	501720	490820	478908	547014	13.510	
(3)	437600	407420	360736	334666	324281	318156	363810	13.383	
(4)	473600	429170	392640	363974	355959	348920	394044	12.410	
(5)	976180	895200	839180	787730	780368	775746	842401	9.493	
41 Aroclor-1268(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
\$ 1 Tetrachloro-m-Xylene	8765400	8524000	8383480	8206820	8182640	8157320	8369943	2.863	
\$ 33 Decachlorobiphenyl (DCB)	9036200	8137400	7697400	6931260	6726533	6806400	7555866	12.114	



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i Injection Date: 26-FEB-2008 09:15  
Lab File ID: 034.D Init. Cal. Date(s): 25-FEB-2008 25-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 18:27 21:18  
Lab Sample ID: AR1660-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m

COMPOUND	RRF / AMOUNT	RFO.500	MIN	RRF	%D / %DRIFT	MAX	%D / %DRIFT	CURVE TYPE
\$ 1 Tetrachloro-m-Xylene	8369943	7717080	0.010		7.80009	15.00000		Averaged
24 Aroclor-1016(1)	161102	152524	0.010		5.32438	15.00000		Averaged
(2)	328615	312224	0.010		4.98798	15.00000		Averaged
(3)	425473	405392	0.010		4.71965	15.00000		Averaged
(4)	295463	282664	0.010		4.33181	15.00000		Averaged
(5)	235684	229000	0.010		2.83591	15.00000		Averaged
30 Aroclor-1260(1)	464568	439964	0.010		5.29611	15.00000		Averaged
(2)	547014	516992	0.010		5.48834	15.00000		Averaged
(3)	363810	346632	0.010		4.72167	15.00000		Averaged
(4)	394044	373140	0.010		5.30494	15.00000		Averaged
(5)	842401	790092	0.010		6.20948	15.00000		Averaged
\$ 33 Decachlorobiphenyl (DCB)	7555866	7187520	0.010		4.87496	15.00000		Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i Injection Date: 26-FEB-2008 20:03  
Lab File ID: 053.D Init. Cal. Date(s): 25-FEB-2008 25-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 18:27 21:18  
Lab Sample ID: AR1660-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m

COMPOUND	RRF / AMOUNT	REF.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1 Tetrachloro-m-Xylene	8369943	7609760	0.010	9.08230	15.00000	Averaged
24 Aroclor-1016(1)	161102	152096	0.010	5.59005	15.00000	Averaged
(2)	328615	309240	0.010	5.89604	15.00000	Averaged
(3)	425473	395192	0.010	7.11698	15.00000	Averaged
(4)	295463	278164	0.010	5.85484	15.00000	Averaged
(5)	235684	226188	0.010	4.02903	15.00000	Averaged
30 Aroclor-1260(1)	464568	437796	0.010	5.76278	15.00000	Averaged
(2)	547014	511096	0.010	6.56619	15.00000	Averaged
(3)	363810	345776	0.010	4.95695	15.00000	Averaged
(4)	394044	372612	0.010	5.43893	15.00000	Averaged
(5)	842401	788956	0.010	6.34433	15.00000	Averaged
33 Decachlorobiphenyl (DCB)	7555866	7272560	0.010	3.74948	15.00000	Averaged

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 18-FEB-2008 15:08  
 End Cal Date : 18-FEB-2008 20:49  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080218.b\8082.m  
 Last Edit : 29-Feb-2008 09:17 jjuares  
 Curve Type : Average

## Calibration File Names:

Level 1: \\Nitro\chem\ECD-7.i\080218.b\011.D  
 Level 2: \\Nitro\chem\ECD-7.i\080218.b\012.D  
 Level 3: \\Nitro\chem\ECD-7.i\080218.b\013.D  
 Level 4: \\Nitro\chem\ECD-7.i\080218.b\014.D  
 Level 5: \\Nitro\chem\ECD-7.i\080218.b\015.D  
 Level 6: \\Nitro\chem\ECD-7.i\080218.b\016.D

Compound	0.10000 Level 1	0.20000 Level 2	0.50000 Level 3	1.000 Level 4	1.500 Level 5	2.000 Level 6	RRF	% RSD
24 Aroclor-1016(1)	160140	164720	152156	136138	129521	126809	144914	11.205
(2)	315380	304320	271460	240310	227909	223382	263794	15.006
(3)	416520	390230	351704	317350	305632	302988	347404	13.654
(4)	289200	289980	264996	235266	224160	220614	254036	12.461
(5)	229540	224200	199012	176198	167103	163220	193212	14.972
25 Aroclor-1221(1)	+++++	+++++	53120	+++++	+++++	+++++	53120	0.000 <-
(2)	+++++	+++++	74692	+++++	+++++	+++++	74692	0.000 <-
(3)	+++++	+++++	48912	+++++	+++++	+++++	48912	0.000 <-
(4)	+++++	+++++	175556	+++++	+++++	+++++	175556	0.000 <-
(5)	+++++	+++++	20988	+++++	+++++	+++++	20988	0.000 <-
26 Aroclor-1232(1)	+++++	+++++	55384	+++++	+++++	+++++	55384	0.000 <-
(2)	+++++	+++++	164280	+++++	+++++	+++++	164280	0.000 <-
(3)	+++++	+++++	124404	+++++	+++++	+++++	124404	0.000 <-
(4)	+++++	+++++	51968	+++++	+++++	+++++	51968	0.000 <-
(5)	+++++	+++++	156164	+++++	+++++	+++++	156164	0.000 <-
27 Aroclor-1242(1)	+++++	+++++	304764	+++++	+++++	+++++	304764	0.000 <-
(2)	+++++	+++++	379432	+++++	+++++	+++++	379432	0.000 <-
(3)	+++++	+++++	184136	+++++	+++++	+++++	184136	0.000 <-
(4)	+++++	+++++	224800	+++++	+++++	+++++	224800	0.000 <-
(5)	+++++	+++++	227828	+++++	+++++	+++++	227828	0.000 <-
28 Aroclor-1248(1)	+++++	+++++	179504	+++++	+++++	+++++	179504	0.000 <-
(2)	+++++	+++++	253776	+++++	+++++	+++++	253776	0.000 <-
(3)	+++++	+++++	278160	+++++	+++++	+++++	278160	0.000 <-
(4)	+++++	+++++	242100	+++++	+++++	+++++	242100	0.000 <-
(5)	+++++	+++++	158816	+++++	+++++	+++++	158816	0.000 <-
29 Aroclor-1254(1)	+++++	+++++	273692	+++++	+++++	+++++	273692	0.000 <-
(2)	+++++	+++++	364576	+++++	+++++	+++++	364576	0.000 <-
(3)	+++++	+++++	496472	+++++	+++++	+++++	496472	0.000 <-

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 18-FEB-2008 15:08  
 End Cal Date : 18-FEB-2008 20:49  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080218.b\8082.m  
 Last Edit : 29-Feb-2008 09:17 jjuares  
 Curve Type : Average

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
	Level 1	Level 2	Level 3	Level 4	Level 5	Level 6			
(4)	+++++	+++++	374224	+++++	+++++	+++++	374224	0.000	<-
(5)	+++++	+++++	342056	+++++	+++++	+++++	342056	0.000	<-
30 Aroclor-1260(1)	444020	415590	366204	322352	307229	303302	359783	16.493	
(2)	662740	612050	542748	482264	465219	463315	538056	15.560	
(3)	330000	319100	286176	251298	238995	235628	276866	14.876	
(4)	384880	375680	338500	298768	287689	284773	328382	13.596	
(5)	779420	737240	666628	597606	585185	594914	660166	12.491	
41 Aroclor-1268(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
\$ 1 Tetrachloro-m-Xylene	8157000	7840100	7348000	6877700	6762960	6831970	7302955	8.018	
\$ 33 Decachlorobiphenyl (DCB)	7695000	7269400	6610800	5783060	5729560	5904360	6498697	12.864	

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i Injection Date: 19-FEB-2008 12:42  
Lab File ID: 036.D Init. Cal. Date(s): 18-FEB-2008 18-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 15:08 20:49  
Lab Sample ID: AR1660-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-7.i\080218.b\8082.m

COMPOUND	RRF / AMOUNT	REF.500	RRF	%D / %DRIFT	MAX	CURVE TYPE
1 Tetrachloro-m-Xylene	7302955	6998400	0.010	4.17030	15.00000	Averaged
24 Aroclor-1016(1)	144914	147508	0.010	-1.78999	15.00000	Averaged
(2)	263794	261412	0.010	0.90281	15.00000	Averaged
(3)	347404	336692	0.010	3.08344	15.00000	Averaged
(4)	254036	249120	0.010	1.93516	15.00000	Averaged
(5)	193212	191904	0.010	0.67703	15.00000	Averaged
30 Aroclor-1260(1)	359783	353904	0.010	1.63401	15.00000	Averaged
(2)	538056	524500	0.010	2.51943	15.00000	Averaged
(3)	276866	277168	0.010	-0.10904	15.00000	Averaged
(4)	328382	327284	0.010	0.33428	15.00000	Averaged
(5)	660166	644812	0.010	2.32571	15.00000	Averaged
33 Decachlorobiphenyl (DCB)	6498697	6356160	0.010	2.19331	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i      Injection Date: 19-FEB-2008 23:19  
Lab File ID: 052.D      Init. Cal. Date(s): 18-FEB-2008    18-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    15:08      20:49  
Lab Sample ID: AR1660-CCV    Quant Type: ESTD  
Method: \\Nitro\chem\ECD-7.i\080218.b\8082.m

COMPOUND	RRF / AMOUNT	REF. 500	MIN	MAX	CURVE TYPE	
\$ 1 Tetrachloro-m-Xylene	7302955	7384680	0.010	-1.11907	15.00000	Averaged
24 Aroclor-1016(1)	144914	148624	0.010	-2.56010	15.00000	Averaged
(2)	263794	271304	0.010	-2.84709	15.00000	Averaged
(3)	347404	351936	0.010	-1.30453	15.00000	Averaged
(4)	254036	264608	0.010	-4.16161	15.00000	Averaged
(5)	193212	198060	0.010	-2.50910	15.00000	Averaged
30 Aroclor-1260(1)	359783	366736	0.010	-1.93259	15.00000	Averaged
(2)	538056	548880	0.010	-2.01170	15.00000	Averaged
(3)	276866	287528	0.010	-3.85092	15.00000	Averaged
(4)	328382	336636	0.010	-2.51362	15.00000	Averaged
(5)	660166	668216	0.010	-1.21946	15.00000	Averaged
\$ 33 Decachlorobiphenyl (DCB)	6498697	6418920	0.010	1.22758	15.00000	Averaged

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 18-FEB-2008 15:08  
 End Cal Date : 18-FEB-2008 20:49  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080218.b\8082.m\8082.m  
 Last Edit : 21-Feb-2008 11:53 jjuares  
 Curve Type : Average

## Calibration File Names:

Level 1: \\Nitro\chem\ECD-7.i\080218.b\080218.b\011.D  
 Level 2: \\Nitro\chem\ECD-7.i\080218.b\080218.b\012.D  
 Level 3: \\Nitro\chem\ECD-7.i\080218.b\080218.b\013.D  
 Level 4: \\Nitro\chem\ECD-7.i\080218.b\080218.b\014.D  
 Level 5: \\Nitro\chem\ECD-7.i\080218.b\080218.b\015.D  
 Level 6: \\Nitro\chem\ECD-7.i\080218.b\080218.b\016.D

Compound	0.10000 Level 1	0.20000 Level 2	0.50000 Level 3	1.000 Level 4	1.500 Level 5	2.000 Level 6	RRF	% RSD
24 Aroclor-1016(1)	168480	153890	144000	129380	124537	124145	140739	12.790
(2)	346880	321590	290028	259948	248484	247588	285753	14.472
(3)	433020	403960	368312	347470	337732	348044	373090	10.101
(4)	301240	282350	260460	235616	225571	225417	255109	12.436
(5)	243060	234020	208568	188740	180920	176819	205355	13.672
25 Aroclor-1221(1)	+++++	+++++	46056	+++++	+++++	+++++	46056	0.000<-
(2)	+++++	+++++	74816	+++++	+++++	+++++	74816	0.000<-
(3)	+++++	+++++	51236	+++++	+++++	+++++	51236	0.000<-
(4)	+++++	+++++	177072	+++++	+++++	+++++	177072	0.000<-
(5)	+++++	+++++	26692	+++++	+++++	+++++	26692	0.000<-
26 Aroclor-1232(1)	+++++	+++++	55756	+++++	+++++	+++++	55756	0.000<-
(2)	+++++	+++++	162064	+++++	+++++	+++++	162064	0.000<-
(3)	+++++	+++++	139772	+++++	+++++	+++++	139772	0.000<-
(4)	+++++	+++++	51280	+++++	+++++	+++++	51280	0.000<-
(5)	+++++	+++++	264540	+++++	+++++	+++++	264540	0.000<-
27 Aroclor-1242(1)	+++++	+++++	326304	+++++	+++++	+++++	326304	0.000<-
(2)	+++++	+++++	687112	+++++	+++++	+++++	687112	0.000<-
(3)	+++++	+++++	187980	+++++	+++++	+++++	187980	0.000<-
(4)	+++++	+++++	251644	+++++	+++++	+++++	251644	0.000<-
(5)	+++++	+++++	281428	+++++	+++++	+++++	281428	0.000<-
28 Aroclor-1248(1)	+++++	+++++	203296	+++++	+++++	+++++	203296	0.000<-
(2)	+++++	+++++	267968	+++++	+++++	+++++	267968	0.000<-
(3)	+++++	+++++	349796	+++++	+++++	+++++	349796	0.000<-
(4)	+++++	+++++	163820	+++++	+++++	+++++	163820	0.000<-
(5)	+++++	+++++	123040	+++++	+++++	+++++	123040	0.000<-
29 Aroclor-1254(1)	+++++	+++++	343716	+++++	+++++	+++++	343716	0.000<-
(2)	+++++	+++++	382476	+++++	+++++	+++++	382476	0.000<-
(3)	+++++	+++++	532440	+++++	+++++	+++++	532440	0.000<-

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 18-FEB-2008 15:08  
 End Cal Date : 18-FEB-2008 20:49  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080218.b\8082.m\8082.m  
 Last Edit : 21-Feb-2008 11:53 jjuares  
 Curve Type : Average

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
Level 1	Level 2	Level 3	Level 4	Level 5	Level 6				
(4)	+++++	+++++	387448	+++++	+++++	+++++	387448	0.000	<-
(5)	+++++	+++++	243648	+++++	+++++	+++++	243648	0.000	<-
30 Aroclor-1260(1)	494500	449000	399484	358658	344169	344176	398331	15.580	
(2)	572660	523550	465640	421478	407088	412487	467151	14.518	
(3)	374520	349510	312812	279196	270461	270853	309559	14.284	
(4)	391640	369430	335936	302326	295753	298087	332195	12.278	
(5)	782300	765400	712284	652406	653440	677203	707172	7.961	
41 Aroclor-1268(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
\$ 1 Tetrachloro-m-Xylene	7287800	7154400	7047920	6771640	6779853	7019350	7010161	2.919	
\$ 33 Decachlorobiphenyl (DCB)	7582200	7377500	6806080	6106560	6083600	6316260	6712033	9.717	



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i Injection Date: 19-FEB-2008 12:42  
Lab File ID: 036.D Init. Cal. Date(s): 18-FEB-2008 18-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 15:08 20:49  
Lab Sample ID: AR1660-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-7.i\080218.b\8082.m\8082.m

COMPOUND	RRF / AMOUNT	RFO.500	RRF	%D / %DRIFT	%D / %DRIFT	CURVE TYPE
\$ 1 Tetrachloro-m-Xylene	7010161	6688440	0.010	4.58935	15.00000	Averaged
24 Aroclor-1016(1)	140739	137468	0.010	2.32397	15.00000	Averaged
(2)	285753	279664	0.010	2.13086	15.00000	Averaged
(3)	373090	355564	0.010	4.69744	15.00000	Averaged
(4)	255109	256688	0.010	-0.61897	15.00000	Averaged
(5)	205355	199424	0.010	2.88793	15.00000	Averaged
30 Aroclor-1260(1)	398331	390820	0.010	1.88567	15.00000	Averaged
(2)	467151	452204	0.010	3.19950	15.00000	Averaged
(3)	309559	304912	0.010	1.50108	15.00000	Averaged
(4)	332195	327360	0.010	1.45559	15.00000	Averaged
(5)	707172	688272	0.010	2.67264	15.00000	Averaged
\$ 33 Decachlorobiphenyl (DCB)	6712033	6615920	0.010	1.43196	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i Injection Date: 19-FEB-2008 23:19  
Lab File ID: 052.D Init. Cal. Date(s): 18-FEB-2008 18-FEB-2008  
Analysis Type: WATER Init. Cal. Times: 15:08 20:49  
Lab Sample ID: AR1660-CCV Quant Type: ESTD  
Method: \\Nitro\chem\ECD-7.i\080218.b\8082.m\8082.m

COMPOUND	RRF / AMOUNT	MIN		MAX		CURVE TYPE
		RFD.500	RRF	%D / %DRIFT	%D / %DRIFT	
19 1 Tetrachloro-m-Xylene	7010161	6904040	0.010	1.51381	15.00000	Averaged
24 Aroclor-1016(1)	140739	143980	0.010	-2.30305	15.00000	Averaged
(2)	285753	286764	0.010	-0.35380	15.00000	Averaged
(3)	373090	368684	0.010	1.18086	15.00000	Averaged
(4)	255109	251072	0.010	1.58244	15.00000	Averaged
(5)	205355	206880	0.010	-0.74286	15.00000	Averaged
30 Aroclor-1260(1)	398331	400148	0.010	-0.45610	15.00000	Averaged
(2)	467151	466092	0.010	0.22659	15.00000	Averaged
(3)	309559	313040	0.010	-1.12459	15.00000	Averaged
(4)	332195	336332	0.010	-1.24523	15.00000	Averaged
(5)	707172	711968	0.010	-0.67817	15.00000	Averaged
33 Decachlorobiphenyl (DCB)	6712033	6630440	0.010	1.21563	15.00000	Averaged

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802327

Instrument ID: FID-8 Calibration Date(s): 12/14/07 12/15/07

Column: ID: 2.00 (mm) Calibration Time(s): 1835 0254

LAB FILE ID: RF10: B0000011 RF50: B0000012 RF100: B0000013  
RF250: B0000014 RF500: B0000015

COMPOUND	RF10	RF50	RF100	RF250	RF500
=====	=====	=====	=====	=====	=====
C6-C12	7097.000	3531.780	2762.820	2246.956	2067.656
>C12-C28	2310.600	2242.240	2219.390	2129.444	2181.016
C28-C35	2310.600	2242.240	2219.390	2129.444	2181.016
=====	=====	=====	=====	=====	=====
Trifluoromethyl benzene	1865.200	1708.900	1959.840	1853.560	1848.910
2-Fluorobiphenyl	2704.600	2494.900	2924.480	2755.600	2711.900

FORM VI TPH

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802327

Instrument ID: FID-8 Calibration Date(s): 12/14/07 12/15/07

Column: ID: 2.00 (mm) Calibration Time(s): 1835 0254

LAB FILE ID: RF1000: B0000016 RF2000: B0000017

COMPOUND	RF1000	RF2000
=====	=====	=====
C6-C12	1990.727	2324.610
>C12-C28	2134.514	2502.706
C28-C35	2134.514	2502.706
=====	=====	=====
Trifluoromethyl benzene	1767.435	
2-Fluorobiphenyl		

FORM VI TPH

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802327

Instrument ID: FID-8 Calibration Date(s): 12/14/07 12/15/07

Column: ID: 2.00 (mm) Calibration Time(s): 1835 0254

COMPOUND	CURVE	COEFFICIENTS		%RSD OR R^2
		A0	A1	
=====	=====	=====	=====	=====
C6-C12	LINR	7.92973050	4.4e-004	0.993
>C12-C28	LINR	33.8987435	4.027e-004	0.994
<del>C28-C35</del>	<del>LINR</del>	<del>33.8987435</del>	<del>4.027e-004</del>	<del>0.994</del>
=====	=====	=====	=====	=====
Trifluoromethyl benzene	AVRG		1833.97417	4.7
2-Fluorobiphenyl	AVRG		2718.29600	5.6
=====	=====	=====	=====	=====

FORM VI TPH

FORM 7  
TPH CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802327

Instrument ID: FID-8 Calibration Date: 02/22/08 Time: 1516

Lab File ID: B0000033 Init. Calib. Date(s): 12/14/07 01/29/08

Init. Calib. Times: 1835 1900

GC Column: \_\_\_\_\_ ID: 2.00 (mm)

COMPOUND	SAMPLE AMOUNT	CAL250 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
C6-C12	294.844	250.000	LINR	17.9	25.0
>C12-C28	242.581	250.000	AVRG	3.0	25.0
<del>C28-C35</del>	<del>0.097</del>	<del>250.000</del>	<del>AVRG</del>	<del>100.0</del>	<del>25.0</del>
=====	=====	=====	=====	=====	=====
Trifluoromethyl benzene	57.044	50.000	AVRG	14.1	25.0
2-Fluorobiphenyl	45.346	50.000	AVRG	9.3	25.0

FORM VII TPH

FORM 7  
TPH CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802327

Instrument ID: FID-8 Calibration Date: 02/22/08 Time: 2048

Lab File ID: B0000041 Init. Calib. Date(s): 12/14/07 01/29/08

Init. Calib. Times: 1835 1900

GC Column: \_\_\_\_\_ ID: 2.00 (mm)

COMPOUND	SAMPLE AMOUNT	CAL250 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
C6-C12	308.431	250.000	LINR	23.4	25.0
>C12-C28	265.394	250.000	AVRG	6.2	25.0
<del>C28-C35</del>	<del>0.000</del>	<del>250.000</del>	<del>AVRG</del>	<del>100.0</del>	<del>25.0</del>
=====	=====	=====	=====	=====	=====
Trifluoromethyl benzene	59.901	50.000	AVRG	19.8	25.0
2-Fluorobiphenyl	53.316	50.000	AVRG	6.6	25.0

FORM VII TPH

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802327

Initial Calibration Source:

Run: ICPMS02 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Arsenic	100.0	101.20	101.2	100.0	100.80	100.8	103.20	103.2	P
Barium	100.0	103.80	103.8	100.0	103.40	103.4	105.20	105.2	P
Cadmium	100.0	105.30	105.3	100.0	103.40	103.4	104.40	104.4	P
Chromium	100.0	101.10	101.1	100.0	104.60	104.6	106.40	106.4	P
Lead	100.0	105.10	105.1	100.0	105.60	105.6	105.90	105.9	P
Selenium	100.0	102.30	102.3	100.0	105.70	105.7	104.60	104.6	P
Silver	100.0	106.00	106	100.0	104.70	104.7	105.80	105.8	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN



2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802327

Initial Calibration Source:

Run: ICPMS02 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Arsenic	100.0	101.20	101.2	100.0	101.50	101.5	102.50	102.5	P
Barium	100.0	103.80	103.8	100.0	101.70	101.7	100.70	100.7	P
Cadmium	100.0	105.30	105.3	100.0	100.50	100.5	101.70	101.7	P
Chromium	100.0	101.10	101.1	100.0	103.50	103.5	105.20	105.2	P
Lead	100.0	105.10	105.1	100.0	103.40	103.4	101.80	101.8	P
Selenium	100.0	102.30	102.3	100.0	104.60	104.6	102.00	102	P
Silver	100.0	106.00	106	100.0	104.90	104.9	102.50	102.5	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802327

Initial Calibration Source:

Run: ICPMS02 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Arsenic	100.0	101.20	101.2	100.0	98.41	98.41	99.34	99.34	P
Barium	100.0	103.80	103.8	100.0	102.30	102.3	101.50	101.5	P
Cadmium	100.0	105.30	105.3	100.0	100.30	100.3	101.70	101.7	P
Chromium	100.0	101.10	101.1	100.0	99.41	99.41	102.00	102	P
Lead	100.0	105.10	105.1	100.0	103.20	103.2	102.50	102.5	P
Selenium	100.0	102.30	102.3	100.0	101.90	101.9	100.20	100.2	P
Silver	100.0	106.00	106	100.0	99.35	99.35	98.94	98.94	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802327

Preparation Blank Matrix (soil/water): WATER

Run: ICPMS02 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): ug/L

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Arsenic	0.0		-0.2		0.0		-0.2		0.000		P
Barium	0.4		-0.1		-0.2		-0.2		0.000		P
Cadmium	0.2	J	-0.4		-0.4		-0.5		0.000		P
Chromium	-0.2		0.0		1.3	J	1.4	J	0.000		P
Lead	0.3	J	-0.3		-0.3		-0.4		0.000		P
Selenium	0.8		1.4		1.9	J	1.8	J	2.029		P
Silver	0.4	J	-0.3		-0.3		-0.3		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802327

Preparation Blank Matrix (soil/water): WATER

Run: ICPMS02 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): ug/L

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Arsenic	0.0		-0.1		0.0		-0.1		0.000		P
Barium	0.4		0.0		0.0		-0.1		0.000		P
Cadmium	0.2	J	-0.4		-0.5		-0.4		0.000		P
Chromium	-0.2		1.4	J	1.9	J	1.4	J	0.000		P
Lead	0.3	J	-0.3		-0.4		-0.3		0.000		P
Selenium	0.8		1.7	J	1.0		1.5		2.029		P
Silver	0.4	J	-0.3		-0.4		-0.3		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

Last Calib: Feb 28, 2008 03:22 am  
 Calibration Type: External Calibration Method  
 Calibration Title: ICP\_OR.S  
 Weighting Method: 1/(SD\*SD)  
 Mass Interpolation Fit for VIS: Point to Point  
 Method: C:\CPCHEM\1\METHODS\ICP\_OR.S.M  
 Multi Tune: #1 022208a5.u  
 #2 022208h1.u

## === Standard Files ===

## &lt;Data Correction&gt;

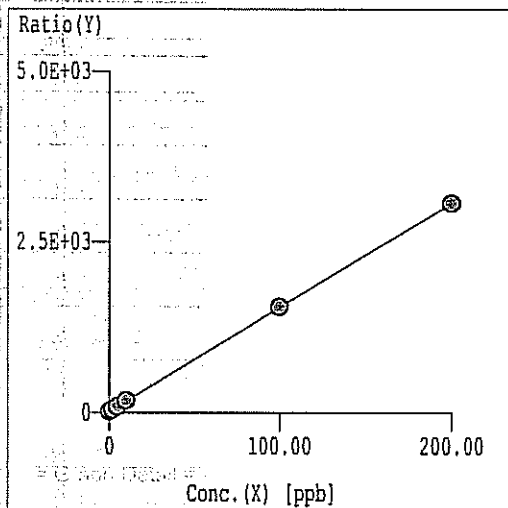
Bkg File: ---  
 Rejected Masses: ---  
 Interference Correction: ON

	Data File	Sample Name	Date Acquired
1	c:\cpcchem\1\data\08b20m00.b\004calb.d\004calb.d#	CAL BLK	Feb 20 2008 12:46 pm
2	c:\cpcchem\1\data\08b20m00.b\005cals.d\005cals.d#	2/10/200	Feb 20 2008 12:52 pm
3	c:\cpcchem\1\data\08b20m00.b\012cals.d\012cals.d#	5/25/500	Feb 20 2008 01:36 pm
4	c:\cpcchem\1\data\08b20m00.b\007cals.d\007cals.d#	10/50/1000	Feb 20 2008 01:05 pm
5	c:\cpcchem\1\data\08b20m00.b\013cals.d\013cals.d#	100/500/10000	Feb 20 2008 01:43 pm
6	c:\cpcchem\1\data\08b20m00.b\015cals.d\015cals.d#	200/1000/20000	Feb 20 2008 01:55 pm
7	---		
8	---		
9	---		
10	---		
11	---		
12	---		
13	---		
14	---		
15	---		
16	---		
17	---		
18	---		
19	---		
20	---		

## === Graph Detail ===

Step Mass Element  
(2) 52 Cr

ISTD Unit  
72 ppb



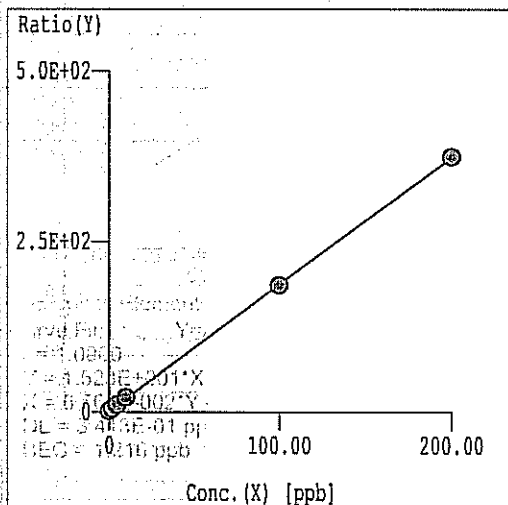
RJct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-2.902E-01	878.9	1.409E+01	P 12.29
2	2.000	1.818	2830	4.621E+01	P 5.182
3	5.000	4.814	5988	9.183E+01	P 1.801
4	10.00	10.55	1.092E+04	1.791E+02	P 6.959E-01
5	100.0	100.3	1.014E+05	1.545E+03	P 1.532
6	200.0	199.8	2.045E+05	3.062E+03	P 1.498
7	X 8.000E-01				
8					
9					
10					
11					
12					
13					
14					
15					
16					
17					
18					
19					
20					

Curve Fit:  $Y=aX+b$   
 $r=1.0000$   
 $Y=1.523E+001*X+1.851E+001$   
 $X=6.566E-002*Y-1.216E+000$   
 $DL=3.413E-01$  ppb  
 $BEC=1.216$  ppb

Weight: OFF  
 Min Conc: 0.000

Step Mass Element  
(2) 75 As

ISTD Unit  
72 ppb



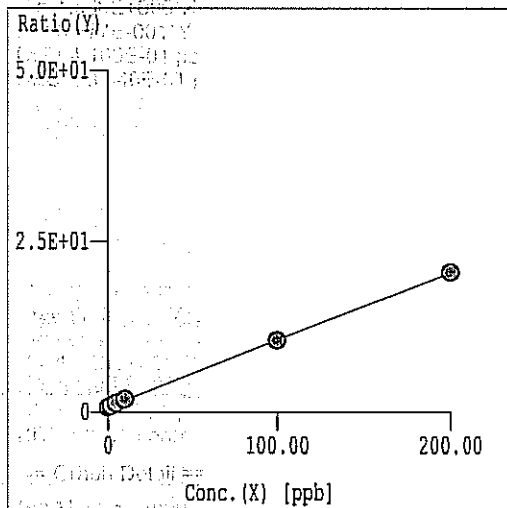
RJct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-1.838E-01	72.22	1.155E+00	P 22.06
2	2.000	1.982	317.8	5.183E+00	P 3.923
3	5.000	5.030	707.8	1.085E+01	P 3.808E-01
4	10.00	10.68	1300	2.136E+01	P 6.905
5	100.0	99.06	1.219E+04	1.857E+02	P 2.340
6	200.0	200.4	2.499E+04	3.743E+02	P 1.141
7	X 8.000E-01				
8					
9					
10					
11					
12					
13					
14					
15					
16					
17					
18					
19					
20					

Curve Fit:  $Y=aX+b$   
 $r=1.0000$   
 $Y=1.860E+000*X+1.496E+000$   
 $X=5.377E-001*Y-8.046E-001$   
 $DL=4.109E-01$  ppb  
 $BEC=8.046E-01$  ppb

Weight: OFF  
 Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 82 Se                72    ppb

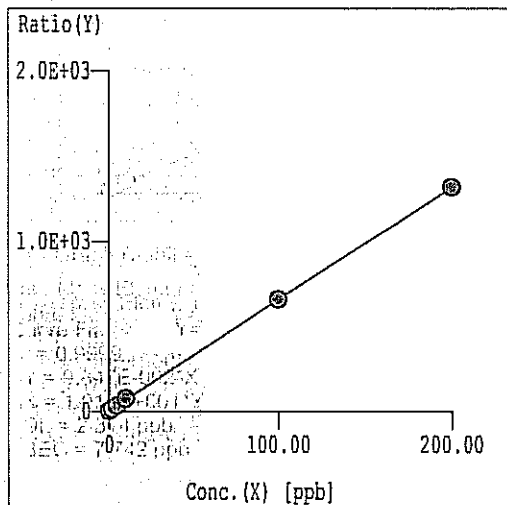


	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-8.941E-01	240.7	6.743E-01	P 11.26
2		2.000	1.352	318.9	8.955E-01	P 3.995
3		5.000	5.668	470.4	1.321E+00	P 2.704
4		10.00	11.42	631.9	1.887E+00	P 5.321
5		100.0	99.06	3730	1.052E+01	P 4.136E-01
6		200.0	200.4	7296	2.049E+01	P 5.488E-01
7	X	8.000E-01				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:  $Y=aX+b$   
 $r = 0.9999$   
 $Y = 9.847E-002 * X + 7.624E-001$   
 $X = 1.016E+001 * Y - 7.742E+000$   
DL = 2.314 ppb  
BEC = 7.742 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 109 Ag                72    ppb



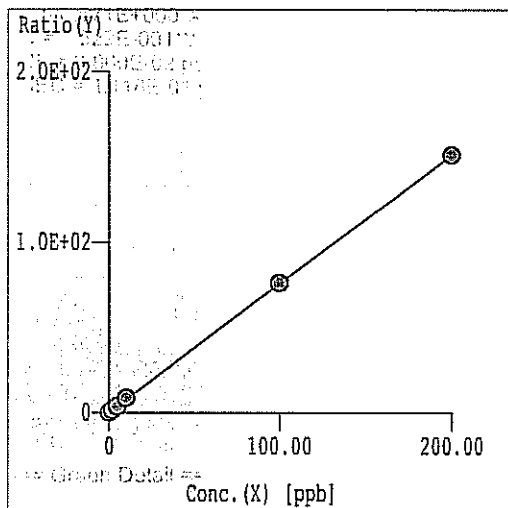
	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-3.527E-01	140.0	3.888E-01	P 21.75
2		2.000	1.738	5031	1.413E+01	P 2.948
3		5.000	4.756	1.210E+04	3.396E+01	P 1.076
4		10.00	11.04	2.521E+04	7.526E+01	P 4.100
5		100.0	99.72	2.333E+05	6.580E+02	P 1.394
6		200.0	200.1	4.691E+05	1.318E+03	P 5.650E-01
7	X	8.000E-01				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 6.571E+000 * X + 2.706E+000$   
 $X = 1.522E-001 * Y - 4.118E-001$   
DL = 3.860E-02 ppb  
BEC = 4.118E-01 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 111 Cd            115    ppb

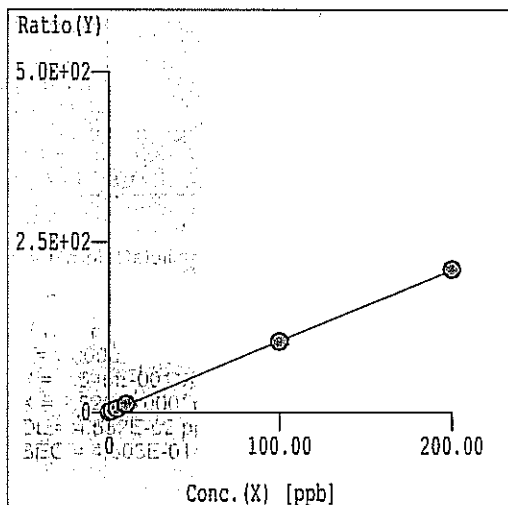


	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-4.339E-01	12.59	1.991E-02	P 57.88
2		2.000	1.700	1024	1.630E+00	P 3.137
3		5.000	4.637	2517	3.846E+00	P 3.948
4		10.00	10.99	5196	8.638E+00	P 7.544
5		100.0	100.3	4.920E+04	7.603E+01	P 2.298
6		200.0	199.8	9.868E+04	1.511E+02	P 7.841E-01
7	X	8.000E-01				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 7.546E-001 * X + 3.473E-001$   
 $X = 1.325E+000 * Y - 4.603E-001$   
 $DL = 4.582E-02$  ppb  
 $BEC = 4.603E-01$  ppb

Weight: OFF  
 Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 137 Ba            115    ppb



	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-2.349E-01	93.34	1.485E-01	P 19.41
2		2.000	1.867	1471	2.342E+00	P 3.820
3		5.000	4.847	3569	5.453E+00	P 2.169
4		10.00	11.08	7190	1.196E+01	P 8.352
5		100.0	98.99	6.710E+04	1.037E+02	P 3.611
6		200.0	200.5	1.369E+05	2.096E+02	P 8.821E-01
7	X	8.000E-01				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Step Mass Element  
 Curve Fit:  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 1.044E+000 * X + 3.937E-001$   
 $X = 9.581E-001 * Y - 3.772E-001$   
 $DL = 8.286E-02$  ppb  
 $BEC = 3.772E-01$  ppb

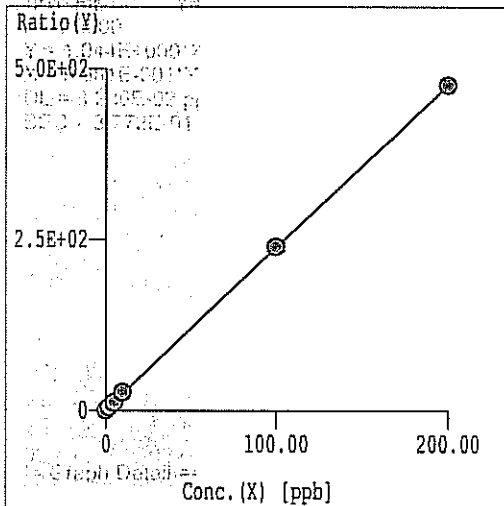
Weight: OFF  
 Min Conc: 0.000



## === Graph Detail ===

Step Mass Element  
(1) 207 Pb

ISTD Unit  
209 ppb



	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-3.836E-01	43.33	1.659E-01	P 14.76
2		2.000	1.679	1319	5.067E+00	P 1.578
3		5.000	4.744	3319	1.235E+01	P 8.431
4		10.00	10.86	6715	2.688E+01	P 6.496
5		100.0	100.3	6.365E+04	2.394E+02	P 2.526
6		200.0	199.8	1.277E+05	4.760E+02	P 4.740E-01
7	X	8.000E-01				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Step Mass Element  
Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 2.377E+000 * X + 1.078E+000$   
 $X = 4.208E-001 * Y - 4.534E-001$   
 $DL = 3.091E-02$  ppb  
 $BEC = 4.534E-01$  ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
 1 14.76  
 2 1.578  
 3 8.431  
 4 6.496  
 5 2.526  
 6 4.740E-01

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802327

Initial Calibration Source:

Run: MERCURY 080222B

Continuing Calibration Source:

Start: 2/22/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Mercury	5.0	4.81	96.2	5.0	5.05	101	5.11	102.2	AV

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802327

Initial Calibration Source:

Run: MERCURY 080222B

Continuing Calibration Source:

Start: 2/22/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Mercury	5.0	4.81	96.2	5.0	5.07	101.4			AV

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802327

Preparation Blank Matrix (soil/water): WATER

Run: MERCURY 080222B

Preparation Blank Concentration Units (ug/L or mg/kg): ug/L

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Mercury	0.0		0.0		0.0		0.0		0.000		AV

Note: MDLs are used, not IDLs

FORM III - IN

# CETAC Hg Analysis Report

Analyst: instrument

Worksheet file: C:\Program Files\QuickTrace\Worksheets\022208AW.wsz

Date Started: 2/22/2008 9:36:06 AM

Comment:

ICA/STD# 731-584-60-7  
MS/LCS STD# 731-584-60-8  
IC. 2/22/08

## Results

Sample Name	Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
Calibration Blank	STD	02/22/08 12:39:17 pm	0.000	98	4.32
Replicates				103.7 96.3 98.6 93.8	
Standard #1	STD	02/22/08 12:41:15 pm	0.200	636	1.42
Replicates				626.2 631.3 644.8 643.0	
Standard #2	STD	02/22/08 12:43:15 pm	1.000	2938	1.12
Replicates				2897.7 2926.7 2955.4 2972.8	
Standard #3	STD	02/22/08 12:45:15 pm	2.000	5853	0.11
Replicates				5853.0 5850.4 5847.7 5862.8	
Standard #4	STD	02/22/08 12:47:18 pm	5.000	14507	0.55
Replicates				14441.6 14451.5 14520.5 14615.3	
Standard #5	STD	02/22/08 12:49:21 pm	10.000	28502	0.62
Replicates				28245.2 28560.4 28654.7 28545.9	

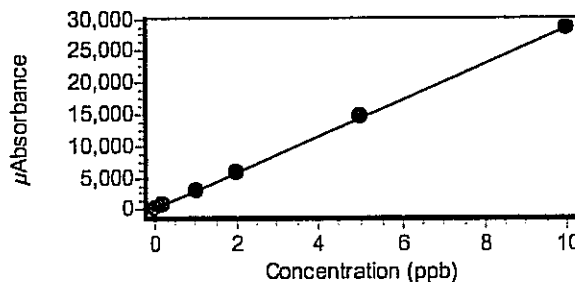
### Calibration

Equation:  $A = 123.235 + 2845.901C$

R<sup>2</sup>: 0.99994

SEE: 95.6386

Flags:



ICV-584-60-09	ICV	02/22/08 12:56:20 pm	4.810	13816	0.27
Replicates				13853.0 13828.1 13817.5 13765.8	
% Recovery				96.23	
ICB	ICB	02/22/08 01:01:46 pm	-0.011	93	6.31
Replicates				98.3 95.7 94.7 84.8	

Sample Name					Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
CRA-584-60-07					CRDL	02/22/08 01:03:45 pm	0.182	641	1.16
Replicates	631.1	639.9	646.7	646.9					
% Recovery	90.99								
GBLKW1-022108					MB	02/22/08 01:05:44 pm	-0.012	90	7.58
Replicates	94.8	97.6	84.1	85.0					
GLCSW1-022108-584-60-08					LCS	02/22/08 01:07:43 pm	4.690	13459	0.89
Replicates	13305.0	13424.0	13532.4	13573.8					
% Recovery	93.72								
GLCSDW1-022108-584-60-08					LCS	02/22/08 01:09:46 pm	4.860	13949	0.33
Replicates	13885.2	13946.7	13982.7	13981.4					
% Recovery	97.16								
0802391-05A					UNK	02/22/08 01:13:59 pm	-0.011	91	4.01
Replicates	86.7	91.4	95.7	91.2					
0802391-05ADUP					DUP	02/22/08 01:16:00 pm	-0.013	85	2.99
Replicates	84.8	88.2	82.1	85.5					
		RPD 0.00							
0802391-05AMS-584-60-08					MSK	02/22/08 01:18:00 pm	5.000	14353	1.03
Replicates	14176.0	14296.8	14428.3	14510.4					
% Recovery	100.27								
0802391-05AMSD-584-60-08					MSDUP	02/22/08 01:20:06 pm	5.290	15183	0.97
Replicates	15021.8	15110.1	15243.8	15356.9					
% Recovery	106.10	RPD 5.67							
CCV-584-60-09					CCV	02/22/08 01:22:07 pm	4.890	14047	0.62
Replicates	13977.0	13976.9	14073.7	14159.1					
% Recovery	97.85								
CCB					CCB	02/22/08 01:24:10 pm	0.015	165	22.26
Replicates	210.2	178.6	140.9	129.9					
0802391-01A					UNK	02/22/08 01:26:09 pm	-0.004	111	4.98
Replicates	119.4	110.7	106.8	109.0					
0802391-02A					UNK	02/22/08 01:28:07 pm	-0.014	84	6.00
Replicates	82.6	78.4	90.3	86.1					

Sample Name					Type	Date/Time	Conc (ppb)	μAbs	%RSD
0802391-03A					UNK	02/22/08 01:30:06 pm	-0.007	103	3.82
Replicates	103.7	99.7	100.0	108.1					
0802391-04E					UNK	02/22/08 01:32:08 pm	-0.014	84	4.16
Replicates	81.9	89.1	81.8	82.9					
0802391-06A					UNK	02/22/08 01:34:08 pm	-0.012	89	7.87
Replicates	89.4	94.9	92.7	79.1					
0802391-07A					UNK	02/22/08 01:36:09 pm	-0.018	72	1.32
Replicates	71.5	71.4	73.2	73.0					
CCV-584-60-09					CCV	02/22/08 01:38:11 pm	5.050	14505	1.04
Replicates	14337.0	14430.1	14574.6	14678.7					
% Recovery	101.07								
CCB					CCB	02/22/08 01:40:17 pm	-0.010	96	16.35
Replicates	115.3	101.4	87.8	79.6					
GBLKW1-022208					MB	02/22/08 01:55:13 pm	-0.015	81	4.10
Replicates	78.8	78.8	85.6	79.6					
GLCSW1-022208-584-60-08					LCS	02/22/08 01:57:15 pm	5.020	14411	1.00
Replicates	14244.2	14341.8	14502.5	14557.4					
% Recovery	100.41								
GLCSDW1-022208-584-60-08					LCS	02/22/08 01:59:20 pm	5.060	14513	0.95
Replicates	14319.4	14510.0	14621.4	14600.0					
% Recovery	101.12								
0802381-01B					UNK	02/22/08 02:03:52 pm	0.011	154	3.86
Replicates	162.3	155.6	148.4	151.6					
0802381-01BDUP					DUP	02/22/08 02:05:51 pm	0.010	152	2.62
Replicates	157.4	153.3	149.6	148.7	RPD 0.00				
0802381-01BMS-584-60-08					MSK	02/22/08 02:07:50 pm	5.290	15186	0.19
Replicates	15154.3	15218.9	15173.1	15197.0					
% Recovery	105.65								

Sample Name					Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
0802381-01BMSD-584-60-08					MSDUP	02/22/08 02:09:54 pm	5.200	14915	0.78
Replicates	14771.9	14874.0	14979.8	15036.3					
% Recovery	103.75	RPD	1.81						
0802392-01B					UNK	02/22/08 02:11:55 pm	0.809	2427	1.29
Replicates	2460.9	2443.0	2411.1	2391.2					
0802392-02B					UNK	02/22/08 02:13:55 pm	0.342	1097	1.32
Replicates	1082.4	1090.4	1100.2	1116.1					
0802392-03B					UNK	02/22/08 02:15:56 pm	0.357	1139	2.69
Replicates	1163.6	1163.0	1132.3	1098.9					
CCV-584-60-09					CCV	02/22/08 02:18:00 pm	5.110	14661	0.89
Replicates	14490.5	14628.3	14745.3	14778.1					
% Recovery	102.16								
CCB					CCB	02/22/08 02:20:03 pm	-0.037	18	15.76
Replicates	21.0	15.4	19.0	15.3					
0802392-04B					UNK	02/22/08 02:22:04 pm	0.038	231	2.10
Replicates	237.2	227.0	232.9	227.4					
0802327-01C					UNK	02/22/08 02:24:06 pm	-0.012	88	9.18
Replicates	77.9	84.9	94.5	94.5					
0802347-04C					UNK	02/22/08 02:26:08 pm	-0.016	77	3.58
Replicates	80.7	78.4	74.6	75.6					
0802392-01B					UNK	02/22/08 02:31:42 pm	0.753	2267	0.32
Replicates	2269.4	2275.7	2263.8	2259.0					
0802392-02B					UNK	02/22/08 02:33:41 pm	0.354	1130	1.44
Replicates	1112.2	1120.7	1140.5	1146.8					
0802392-03B					UNK	02/22/08 02:35:42 pm	0.383	1214	0.84
Replicates	1225.4	1216.5	1211.3	1201.1					



Sample Name					Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
CCV-584-60-09					CCV	02/22/08 02:37:45 pm	5.070	14550	0.45
Replicates		14457.7	14547.8	14589.6	14605.2				
% Recovery		101.39							
CCB					CCB	02/22/08 02:39:46 pm	-0.035	23	18.55
Replicates		16.9	23.8	26.9	23.0				



Sample Receipt Checklist

Client Name: MALCOLM PIRNIE

Date/Time Received: 2/18/2008 7:30:00 AM

Work Order Number 0802327

Received by: RSZ

Checklist completed by

Signature

Date

Reviewed by

Initials

Date

Matrix:

Carrier name: FedEx

Shipping container/cooler in good condition?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	Not Present <input type="checkbox"/>
Custody seals intact on shipping container/cooler?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	Not Present <input type="checkbox"/>
Custody seals intact on sample bottles?	Yes <input type="checkbox"/>	No <input type="checkbox"/>	Not Present <input checked="" type="checkbox"/>
Chain of custody present?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Chain of custody signed when relinquished and received?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Chain of custody agrees with sample labels?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Samples in proper container/bottle?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Sample containers intact?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Sufficient sample volume for indicated test?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
All samples received within holding time?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Container/Temp Blank temperature in compliance?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Temperature(s)/Thermometer(s):	<u>2.7c</u>	<u>002</u>	
Cooler(s)/Kit(s):	<u>2070</u>		
Water - VOA vials have zero headspace?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	No VOA vials submitted <input type="checkbox"/>
Water - pH acceptable upon receipt?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	N/A <input type="checkbox"/>

Adjusted?

Checked by

Login Notes:

Client contacted:

Date contacted:

Person contacted

Contacted by:

Regarding:

Comments:

Corrective Action

2/16/08 FedEx Tracking Number 8641706517102330

Sender's Name: Colin Nelson Phone: 218 3039316

Company: Malcolm Pirnie

Address: 1700 West Loop South #1450

City: Houston State: TX ZIP: 77027

our Internal Billing Reference

2/16/08 FedEx Tracking Number 8641706517312010

Sender's Name: Colin Nelson Phone: 218 3039316

Company: Malcolm Pirnie

Address: 1700 West Loop South #1450

City: Houston State: TX ZIP: 77027

our Internal Billing Reference

2/16/08 FedEx Tracking Number 8641706518451598

Sender's Name: Colin Nelson Phone: 218 3039316

Company: Malcolm Pirnie

Address: 1700 West Loop South #1450

City: Houston State: TX ZIP: 77027

our Internal Billing Reference

**ALS e-Lab Analytical**  
 10450 Stancilff Rd., Suite 210  
 Houston, Texas 77099  
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Date:  
 Name:  
 Comp:

Date:  
 Name:  
 Comp:

Date:  
 Name:  
 Company:

**CUSTODY SEAL**

1/08 Time: 4:06  
 Colin Nelson  
 Malcolm Pirnie

**CUSTODY SEAL**

2/16/08 Time: 4:16  
 Colin Nelson  
 Malcolm Pirnie

**CUSTODY SEAL**

2/16/08

2/16/08  
 Seal Broken By:

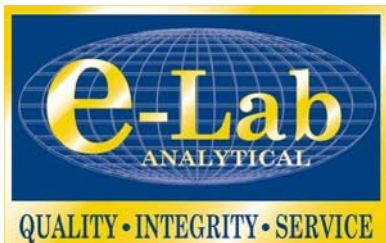
Date:  
 2/16/08

2/16/08  
 Seal Broken By:

Date:  
 2/16/08

2/16/08  
 Seal Broken By:

Date:  
 2/16/08



February 28, 2008

Michael Forlenza  
Malcolm Pirnie, Inc.  
1700 West Loop South  
Suite 1450  
Houston, TX 77027

Tel: (713) 840-1511  
Fax: (713) 840-1207

Re: Oro Grande LF-Shallow Borings

Work Order : **0802300**

Dear Michael Forlenza,

e-Lab Analytical, Inc. received 13 samples on 2/15/2008 09:15 AM for the analyses presented in the following report.

The analytical data provided relates directly to the samples received by e-Lab Analytical, Inc. and for only the analyses requested. Results are expressed as "as received" unless otherwise noted.

QC sample results for this data met EPA or laboratory specifications except as noted in the Case Narrative or as noted with qualifiers in the QC batch information. Should this laboratory report need to be reproduced, it should be reproduced in full unless written approval has been obtained by e-Lab Analytical, Inc. Samples will be disposed in 30 days unless storage arrangements are made.

The total number of pages in this report is 368.

If you have any questions regarding this report, please feel free to call me.

Sincerely,

Electronically approved by: Glenda H. Ramos

Ed B. Fry  
Project Manager



Certificate No: T104704231-06-TX

**e.Lab Analytical, Inc.**  
Part of the **ALS Laboratory Group**  
10450 Stancliff Rd, Suite 210 Houston, Texas 77099-4338  
Phone: (281) 530-5656 Fax: (281) 530-5887  
[www.elabi.com](http://www.elabi.com) [www.alsglobal.com](http://www.alsglobal.com)  
*A Campbell Brothers Limited Company*

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Work Order:** 0802300

**Work Order Sample Summary**

<u>Lab Samp ID</u>	<u>Client Sample ID</u>	<u>Matrix</u>	<u>Tag Number</u>	<u>Collection Date</u>	<u>Date Received</u>	<u>Hold</u>
0802300-01	F14-SB-1 (0-2)	Soil		2/13/2008 16:35	2/15/2008 09:15	<input type="checkbox"/>
0802300-02	F14-SB-1 (13-15)	Soil		2/13/2008 16:45	2/15/2008 09:15	<input type="checkbox"/>
0802300-03	F14-SB-1 (28-30)	Soil		2/13/2008 17:15	2/15/2008 09:15	<input type="checkbox"/>
0802300-04	F14-SB-4 (0-2)	Soil		2/13/2008 15:25	2/15/2008 09:15	<input type="checkbox"/>
0802300-05	F14-SB-4 (13-15)	Soil		2/13/2008 15:37	2/15/2008 09:15	<input type="checkbox"/>
0802300-06	F14-SB-4 (28-30)	Soil		2/13/2008 15:55	2/15/2008 09:15	<input type="checkbox"/>
0802300-07	DUP-2	Soil		2/13/2008	2/15/2008 09:15	<input type="checkbox"/>
0802300-08	DUP-3	Soil		2/13/2008	2/15/2008 09:15	<input type="checkbox"/>
0802300-09	Rinsate-1	Water		2/14/2008 08:30	2/15/2008 09:15	<input type="checkbox"/>
0802300-10	Rinsate-2	Water		2/14/2008 09:00	2/15/2008 09:15	<input type="checkbox"/>
0802300-11	Trip Blank 1	Water		2/14/2008 09:00	2/15/2008 09:15	<input type="checkbox"/>
0802300-12	Trip Blank 2	Water		2/14/2008 09:00	2/15/2008 09:15	<input type="checkbox"/>
0802300-13	Trip Blank 3	Water		2/14/2008 09:00	2/15/2008 09:15	<input type="checkbox"/>

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Work Order:** 0802300

**Case Narrative**

Batch 28298, Herbicides, LCS/LCSD are "P" qualified for Dalpon due to coelution on the confirming column. Results are reported from the non-coeluting column.

Batch 28371, Herbicides, MS/MSD are "P" qualified for MCPP due to coelution on the confirming column. Results are reported from the non-coeluting column.

Batch 28303, Metals, Sample 0802300-02, F14-SB-1 (13-15), MS/MSD recoveries were outside control limits for some compounds. Results are flagged with "E" and "O" qualifiers as applicable. Associated RPDs are within control limits.

Batch 28295, Semivolatile Organics, Sample 0802300-03, F14-SB-1 (28-30) MS/MSD RPD was outside control limits for Pentachlorophenol. Individual recoveries were within control limits.

Batch R60091, Volatile Organics, Sample 0802352-01 : MS/MSD is an unrelated sample.

Batch R60110, Phosphorus, Sample 0802300-01, F14-SB-1 (0-2) : MS recovery was above control limits for Total Phosphorus.

Batch R60293, Silica, Sample 0802300-01, F14-SB-1 (0-2) : MS recovery was below control limits for Dissolved Silica.

# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-1 (0-2)  
**Collection Date:** 2/13/2008 4:35:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-01  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	99.2			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	92.1			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	U		0.50	1.7	mg/Kg	1	2/22/2008
Surr: 2-Fluorobiphenyl	92.5			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	9.45	J	1.4	13.3	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/19/08		Analyst: <b>ALR</b>
Aluminum	4,280		72	194	mg/Kg	200	2/20/2008
Antimony	U		0.14	0.485	mg/Kg	1	2/19/2008
Arsenic	1.92		0.13	0.485	mg/Kg	1	2/19/2008
Barium	110		0.068	0.485	mg/Kg	1	2/19/2008
Beryllium	0.285	J	0.029	0.485	mg/Kg	1	2/19/2008
Boron	2.88		0.39	2.43	mg/Kg	1	2/19/2008
Cadmium	0.101	J	0.029	0.485	mg/Kg	1	2/19/2008
Calcium	49,400		1,900	9,710	mg/Kg	200	2/20/2008
Chromium	3.10		0.068	0.485	mg/Kg	1	2/19/2008
Cobalt	1.70		0.017	0.485	mg/Kg	1	2/19/2008
Copper	1.95		0.039	0.485	mg/Kg	1	2/19/2008
Iron	3,600		4.3	48.5	mg/Kg	1	2/19/2008
Lead	3.35		0.087	0.485	mg/Kg	1	2/19/2008
Magnesium	2,030		2.5	48.5	mg/Kg	1	2/19/2008
Manganese	69.0		0.049	0.485	mg/Kg	1	2/19/2008
Molybdenum	0.200	J	0.097	0.485	mg/Kg	1	2/19/2008
Nickel	3.06		0.078	0.485	mg/Kg	1	2/19/2008
Potassium	928		2.5	48.5	mg/Kg	1	2/19/2008
Selenium	0.445	J	0.18	0.485	mg/Kg	1	2/19/2008
Silver	0.0285	J	0.019	0.485	mg/Kg	1	2/19/2008
Sodium	83.8		8.8	48.5	mg/Kg	1	2/19/2008
Strontium	90.1		0.097	0.485	mg/Kg	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time



**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-1 (0-2)  
**Collection Date:** 2/13/2008 4:35:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-01  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	0.0813	J	0.049	0.485	mg/Kg	1	2/19/2008
Tin	1.03	J	0.39	2.43	mg/Kg	1	2/19/2008
Titanium	94.0		0.068	0.485	mg/Kg	1	2/19/2008
Vanadium	10.1		0.054	0.485	mg/Kg	1	2/19/2008
Zinc	9.47		0.097	0.485	mg/Kg	1	2/19/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>
Lithium	U		4.8	4.76	mg/Kg	1	2/27/2008
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>				Analyst: <b>RKG</b>
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/25/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/25/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/25/2008
Acetone	U		2.0	25	µg/Kg	1	2/25/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
Bromoform	U		0.50	10	µg/Kg	1	2/25/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/25/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/25/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/25/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/25/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/25/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/25/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/25/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/25/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

AR Page 2 of 49

# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-1 (0-2)  
**Collection Date:** 2/13/2008 4:35:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-01  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
<b>Dichloromethane</b>	<b>5.1</b>	<b>J</b>	<b>3.0</b>	<b>10</b>	<b>µg/Kg</b>	<b>1</b>	<b>2/25/2008</b>
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/25/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/25/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/25/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/25/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/25/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/25/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/25/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/25/2008
Surr: 1,2-Dichloroethane-d4	103			70-128	%REC	1	2/25/2008
Surr: 4-Bromofluorobenzene	101			73-126	%REC	1	2/25/2008
Surr: Dibromofluoromethane	101			71-128	%REC	1	2/25/2008
Surr: Toluene-d8	100			73-127	%REC	1	2/25/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/22/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/22/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
<b>Percent Moisture</b>	<b>2.34</b>		<b>0.010</b>	<b>0.0100</b>	<b>wt%</b>	<b>1</b>	<b>2/19/2008</b>
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>				Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.65	0.650	mg/Kg	5	2/20/2008
<b>Phosphorus, Total (As P)</b>	<b>88.8</b>		<b>1.0</b>	<b>2.50</b>	<b>mg/Kg</b>	<b>5</b>	<b>2/20/2008</b>
Phosphorus, Total Orthophosphate (As P)	U		0.65	0.650	mg/Kg	5	2/20/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SiD</b>				Analyst: <b>IGF</b>
<b>Silica, Dissolved (as SiO2)</b>	<b>16.3</b>		<b>0.020</b>	<b>0.100</b>	<b>mg/kg</b>	<b>1</b>	<b>2/26/2008</b>

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-1 (13-15)  
**Collection Date:** 2/13/2008 4:45:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-02  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>MISCELLANEOUS PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
alpha-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
gamma-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
<b>ORGANOCHLORINE PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
4,4'-DDD	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDE	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDT	U		0.23	3.3	µg/Kg	1	2/24/2008
Aldrin	U		0.20	1.7	µg/Kg	1	2/24/2008
alpha-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
beta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Chlordane	U		3.0	17	µg/Kg	1	2/24/2008
delta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Dieldrin	U		0.20	3.3	µg/Kg	1	2/24/2008
Endosulfan I	U		0.20	1.7	µg/Kg	1	2/24/2008
Endosulfan II	U		0.30	3.3	µg/Kg	1	2/24/2008
Endosulfan sulfate	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin	U		0.22	3.3	µg/Kg	1	2/24/2008
Endrin aldehyde	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin ketone	U		0.25	3.3	µg/Kg	1	2/24/2008
gamma-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor epoxide	U		0.20	1.7	µg/Kg	1	2/24/2008
Methoxychlor	U		1.7	17	µg/Kg	1	2/24/2008
Toxaphene	U		5.8	17	µg/Kg	1	2/24/2008
Surr: Decachlorobiphenyl	95.3			59-144	%REC	1	2/24/2008
Surr: Tetrachloro-m-xylene	85.0			56.9-130	%REC	1	2/24/2008
<b>CHLORINATED HERBICIDES</b>							
			Method: <b>SW8151</b>		Prep: SW3550 / 2/22/08		Analyst: <b>JLJ</b>
2,4,5-T	U		0.60	3.3	µg/Kg	1	2/24/2008
2,4,5-TP (Silvex)	U		0.50	3.3	µg/Kg	1	2/24/2008
2,4-D	U		1.0	6.6	µg/Kg	1	2/24/2008
2,4-DB	U		1.7	6.6	µg/Kg	1	2/24/2008
Dalapon	U		1.6	3.3	µg/Kg	1	2/24/2008
Dicamba	U		1.5	3.3	µg/Kg	1	2/24/2008
Dichlorprop	U		3.0	6.6	µg/Kg	1	2/24/2008
Dinoseb	U		0.50	3.3	µg/Kg	1	2/24/2008
MCPA	U		150	660	µg/Kg	1	2/24/2008
MCPP	U		140	660	µg/Kg	1	2/24/2008
Surr: DCAA	106			30-150	%REC	1	2/24/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-1 (13-15)  
**Collection Date:** 2/13/2008 4:45:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-02  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	99.6			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	94.1			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	U		0.50	1.7	mg/Kg	1	2/22/2008
Surr: 2-Fluorobiphenyl	98.0			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	U		1.4	13.3	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/19/08		Analyst: <b>ALR</b>
Aluminum	2,980		69	187	mg/Kg	200	2/20/2008
Antimony	U		0.13	0.467	mg/Kg	1	2/19/2008
Arsenic	1.77		0.12	0.467	mg/Kg	1	2/19/2008
Barium	16.9		0.065	0.467	mg/Kg	1	2/19/2008
Beryllium	0.209	J	0.028	0.467	mg/Kg	1	2/19/2008
Boron	4.73		0.37	2.34	mg/Kg	1	2/19/2008
Cadmium	0.0723	J	0.028	0.467	mg/Kg	1	2/19/2008
Calcium	14,800		9.3	46.7	mg/Kg	1	2/19/2008
Chromium	2.91		0.065	0.467	mg/Kg	1	2/19/2008
Cobalt	1.04		0.016	0.467	mg/Kg	1	2/19/2008
Copper	0.961		0.037	0.467	mg/Kg	1	2/19/2008
Iron	2,840		4.1	46.7	mg/Kg	1	2/19/2008
Lead	2.51		0.084	0.467	mg/Kg	1	2/19/2008
Magnesium	1,820		2.4	46.7	mg/Kg	1	2/19/2008
Manganese	43.7		0.047	0.467	mg/Kg	1	2/19/2008
Molybdenum	0.173	J	0.093	0.467	mg/Kg	1	2/19/2008
Nickel	2.07		0.075	0.467	mg/Kg	1	2/19/2008
Potassium	744		2.4	46.7	mg/Kg	1	2/19/2008
Selenium	0.247	J	0.18	0.467	mg/Kg	1	2/19/2008
Silver	0.0281	J	0.019	0.467	mg/Kg	1	2/19/2008
Sodium	403		8.5	46.7	mg/Kg	1	2/19/2008
Strontium	56.9		0.093	0.467	mg/Kg	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-1 (13-15)  
**Collection Date:** 2/13/2008 4:45:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-02  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	0.0591	J	0.047	0.467	mg/Kg	1	2/19/2008
Tin	1.07	J	0.37	2.34	mg/Kg	1	2/19/2008
Titanium	66.5		0.065	0.467	mg/Kg	1	2/19/2008
Vanadium	10.9		0.052	0.467	mg/Kg	1	2/19/2008
Zinc	5.96		0.093	0.467	mg/Kg	1	2/19/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>
Lithium	5.63		4.8	4.81	mg/Kg	1	2/27/2008
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>		Analyst: <b>RKG</b>		
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/25/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/25/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/25/2008
Acetone	U		2.0	25	µg/Kg	1	2/25/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
Bromoform	U		0.50	10	µg/Kg	1	2/25/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/25/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/25/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/25/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/25/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/25/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/25/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/25/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/25/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-1 (13-15)  
**Collection Date:** 2/13/2008 4:45:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-02  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
<b>Dichloromethane</b>	<b>5.4</b>	<b>J</b>	<b>3.0</b>	<b>10</b>	<b>µg/Kg</b>	<b>1</b>	<b>2/25/2008</b>
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/25/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/25/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/25/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/25/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/25/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/25/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/25/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/25/2008
Surr: 1,2-Dichloroethane-d4	100			70-128	%REC	1	2/25/2008
Surr: 4-Bromofluorobenzene	98.5			73-126	%REC	1	2/25/2008
Surr: Dibromofluoromethane	100			71-128	%REC	1	2/25/2008
Surr: Toluene-d8	97.8			73-127	%REC	1	2/25/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/22/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/22/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
Percent Moisture	<b>2.50</b>		<b>0.010</b>	<b>0.0100</b>	<b>wt%</b>	<b>1</b>	<b>2/19/2008</b>
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>				Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.13	0.130	mg/Kg	1	2/20/2008
<b>Phosphorus, Total (As P)</b>	<b>17.2</b>		<b>0.20</b>	<b>0.500</b>	<b>mg/Kg</b>	<b>1</b>	<b>2/20/2008</b>
Phosphorus, Total Orthophosphate (As P)	U		0.13	0.130	mg/Kg	1	2/20/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SID</b>				Analyst: <b>IGF</b>
Silica, Dissolved (as SiO2)	<b>8.65</b>		<b>0.020</b>	<b>0.100</b>	<b>mg/kg</b>	<b>1</b>	<b>2/26/2008</b>

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-1 (28-30)  
**Collection Date:** 2/13/2008 5:15:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-03  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	105			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	95.9			55-137	%REC	1	2/26/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	U		1.4	13.1	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/19/08		Analyst: <b>ALR</b>
Aluminum	6,000		35	94.3	mg/Kg	100	2/20/2008
Antimony	U		0.13	0.472	mg/Kg	1	2/19/2008
Arsenic	3.38		0.12	0.472	mg/Kg	1	2/19/2008
Barium	24.6		0.066	0.472	mg/Kg	1	2/19/2008
Beryllium	0.304	J	0.028	0.472	mg/Kg	1	2/19/2008
Boron	7.42		0.38	2.36	mg/Kg	1	2/19/2008
Cadmium	0.0791	J	0.028	0.472	mg/Kg	1	2/19/2008
Calcium	32,700		940	4,720	mg/Kg	100	2/20/2008
Chromium	4.14		0.066	0.472	mg/Kg	1	2/19/2008
Cobalt	1.96		0.016	0.472	mg/Kg	1	2/19/2008
Copper	1.87		0.038	0.472	mg/Kg	1	2/19/2008
Iron	4,640		4.2	47.2	mg/Kg	1	2/19/2008
Lead	3.22		0.085	0.472	mg/Kg	1	2/19/2008
Magnesium	3,720		2.5	47.2	mg/Kg	1	2/19/2008
Manganese	72.0		0.047	0.472	mg/Kg	1	2/19/2008
Molybdenum	0.256	J	0.094	0.472	mg/Kg	1	2/19/2008
Nickel	3.78		0.075	0.472	mg/Kg	1	2/19/2008
Potassium	1,700		2.5	47.2	mg/Kg	1	2/19/2008
Selenium	0.407	J	0.18	0.472	mg/Kg	1	2/19/2008
Silver	0.0204	J	0.019	0.472	mg/Kg	1	2/19/2008
Sodium	433		8.6	47.2	mg/Kg	1	2/19/2008
Strontium	80.4		0.094	0.472	mg/Kg	1	2/19/2008
Thallium	0.0836	J	0.047	0.472	mg/Kg	1	2/19/2008
Tin	1.13	J	0.38	2.36	mg/Kg	1	2/19/2008
Titanium	102		0.066	0.472	mg/Kg	1	2/19/2008
Vanadium	17.8		0.053	0.472	mg/Kg	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-1 (28-30)  
**Collection Date:** 2/13/2008 5:15:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-03  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Zinc	10.5		0.094	0.472	mg/Kg	1	2/19/2008
<b>ICP METALS, TOTAL - SW6020A</b>		Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>	
Lithium	9.30		4.6	4.63	mg/Kg	1	2/27/2008
<b>LOW-LEVEL TCL SEMIVOLATILE ORGANICS</b>		Method: <b>SW8270</b>		Prep: SW3541 / 2/19/08		Analyst: <b>LG</b>	
1,1'-Biphenyl	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,5-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,6-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dimethylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dinitrophenol	U		30	30	µg/Kg	1	2/20/2008
2,4-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2,6-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chloronaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylnaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3&4-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3,3'-Dichlorobenzidine	U		6.6	6.6	µg/Kg	1	2/20/2008
3-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4,6-Dinitro-2-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Bromophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloro-3-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chlorophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Nitroaniline	U		30	30	µg/Kg	1	2/20/2008
4-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acetophenone	U		6.6	6.6	µg/Kg	1	2/20/2008
Anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Atrazine	U		6.6	6.6	µg/Kg	1	2/20/2008
Benz(a)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzaldehyde	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(a)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(b)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(g,h,i)perylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(k)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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## e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF-Shallow Borings  
 Sample ID: F14-SB-1 (28-30)  
 Collection Date: 2/13/2008 5:15:00 PM

Work Order: 0802300  
 Lab ID: 0802300-03  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Bis(2-chloroethoxy)methane	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroethyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroisopropyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Bis(2-ethylhexyl)phthalate</b>	<b>14</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Butyl benzyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Caprolactam</b>	<b>25</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Carbazole	U		6.6	6.6	µg/Kg	1	2/20/2008
Chrysene	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Di-n-butyl phthalate</b>	<b>11</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Di-n-octyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenz(a,h)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenzofuran	U		6.6	6.6	µg/Kg	1	2/20/2008
Diethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dimethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluorene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobutadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorocyclopentadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachloroethane	U		6.6	6.6	µg/Kg	1	2/20/2008
Indeno(1,2,3-cd)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Isophorone	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodi-n-propylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodiphenylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
Naphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
Nitrobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Pentachlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenanthrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Surr: 2,4,6-Tribromophenol	78.3			36-126	%REC	1	2/20/2008
Surr: 2-Fluorobiphenyl	70.8			43-125	%REC	1	2/20/2008
Surr: 2-Fluorophenol	80.4			37-125	%REC	1	2/20/2008
Surr: 4-Terphenyl-d14	97.2			32-125	%REC	1	2/20/2008
Surr: Nitrobenzene-d5	72.9			37-125	%REC	1	2/20/2008
Surr: Phenol-d6	75.1			40-125	%REC	1	2/20/2008
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>				Analyst: <b>RKG</b>
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichloro-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/25/2008

Qualifiers: U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-1 (28-30)  
**Collection Date:** 2/13/2008 5:15:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-03  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/25/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/25/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/25/2008
Acetone	U		2.0	25	µg/Kg	1	2/25/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
Bromoform	U		0.50	10	µg/Kg	1	2/25/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/25/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/25/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/25/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/25/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/25/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/25/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/25/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/25/2008
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
<b>Dichloromethane</b>	<b>5.2</b>	<b>J</b>	<b>3.0</b>	<b>10</b>	<b>µg/Kg</b>	<b>1</b>	<b>2/25/2008</b>
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/25/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/25/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/25/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/25/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/25/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/25/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-1 (28-30)  
**Collection Date:** 2/13/2008 5:15:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-03  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/25/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/25/2008
Surr: 1,2-Dichloroethane-d4	100			70-128	%REC	1	2/25/2008
Surr: 4-Bromofluorobenzene	99.1			73-126	%REC	1	2/25/2008
Surr: Dibromofluoromethane	99.7			71-128	%REC	1	2/25/2008
Surr: Toluene-d8	98.0			73-127	%REC	1	2/25/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/22/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/22/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
Percent Moisture	<b>8.70</b>		<b>0.010</b>	<b>0.0100</b>	wt%	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>				Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.65	0.650	mg/Kg	5	2/20/2008
Phosphorus, Total (As P)	<b>50.0</b>		<b>1.0</b>	<b>2.50</b>	mg/Kg	5	2/20/2008
Phosphorus, Total Orthophosphate (As P)	U		0.65	0.650	mg/Kg	5	2/20/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SID</b>				Analyst: <b>IGF</b>
Silica, Dissolved (as SiO2)	<b>14.0</b>		<b>0.020</b>	<b>0.100</b>	mg/kg	1	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

**e-Lab Analytical, Inc.**
**Date:** February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-4 (0-2)  
**Collection Date:** 2/13/2008 3:25:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-04  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	97.4			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	94.8			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	U		0.50	1.7	mg/Kg	1	2/22/2008
Surr: 2-Fluorobiphenyl	87.2			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	5.24	J	1.4	13.1	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/19/08		Analyst: <b>ALR</b>
Aluminum	5,430		36	96.2	mg/Kg	100	2/20/2008
Antimony	U		0.13	0.481	mg/Kg	1	2/19/2008
Arsenic	2.77		0.12	0.481	mg/Kg	1	2/19/2008
Barium	119		0.067	0.481	mg/Kg	1	2/19/2008
Beryllium	0.346	J	0.029	0.481	mg/Kg	1	2/19/2008
Boron	5.12		0.38	2.40	mg/Kg	1	2/19/2008
Cadmium	0.0939	J	0.029	0.481	mg/Kg	1	2/19/2008
Calcium	48,400		960	4,810	mg/Kg	100	2/20/2008
Chromium	3.54		0.067	0.481	mg/Kg	1	2/19/2008
Cobalt	2.05		0.016	0.481	mg/Kg	1	2/19/2008
Copper	2.37		0.038	0.481	mg/Kg	1	2/19/2008
Iron	4,320		4.2	48.1	mg/Kg	1	2/19/2008
Lead	4.06		0.087	0.481	mg/Kg	1	2/19/2008
Magnesium	2,320		2.5	48.1	mg/Kg	1	2/19/2008
Manganese	90.5		0.048	0.481	mg/Kg	1	2/19/2008
Molybdenum	0.208	J	0.096	0.481	mg/Kg	1	2/19/2008
Nickel	4.14		0.077	0.481	mg/Kg	1	2/19/2008
Potassium	1,290		2.5	48.1	mg/Kg	1	2/19/2008
Selenium	0.600		0.18	0.481	mg/Kg	1	2/19/2008
Silver	0.0270	J	0.019	0.481	mg/Kg	1	2/19/2008
Sodium	266		8.8	48.1	mg/Kg	1	2/19/2008
Strontium	101		0.096	0.481	mg/Kg	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-4 (0-2)  
**Collection Date:** 2/13/2008 3:25:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-04  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	0.0798	J	0.048	0.481	mg/Kg	1	2/19/2008
Tin	0.972	J	0.38	2.40	mg/Kg	1	2/19/2008
Titanium	105		0.067	0.481	mg/Kg	1	2/19/2008
Vanadium	12.1		0.054	0.481	mg/Kg	1	2/19/2008
Zinc	10.5		0.096	0.481	mg/Kg	1	2/19/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: SW6020		Prep: SW3050A / 2/22/08		Analyst: SA
Lithium	4.82		4.8	4.81	mg/Kg	1	2/27/2008
<b>TCL VOLATILE ORGANICS</b>			Method: SW8260				Analyst: RKG
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/25/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/25/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/25/2008
Acetone	U		2.0	25	µg/Kg	1	2/25/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
Bromoform	U		0.50	10	µg/Kg	1	2/25/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/25/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/25/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/25/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/25/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/25/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/25/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/25/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/25/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-4 (0-2)  
**Collection Date:** 2/13/2008 3:25:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-04  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
<b>Dichloromethane</b>	<b>5.7</b>	<b>J</b>	<b>3.0</b>	<b>10</b>	<b>µg/Kg</b>	<b>1</b>	<b>2/25/2008</b>
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/25/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/25/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/25/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/25/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/25/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/25/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/25/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/25/2008
Surr: 1,2-Dichloroethane-d4	105			70-128	%REC	1	2/25/2008
Surr: 4-Bromofluorobenzene	99.3			73-126	%REC	1	2/25/2008
Surr: Dibromofluoromethane	102			71-128	%REC	1	2/25/2008
Surr: Toluene-d8	96.5			73-127	%REC	1	2/25/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/22/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/22/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
<b>Percent Moisture</b>	<b>18.1</b>		<b>0.010</b>	<b>0.0100</b>	<b>wt%</b>	<b>1</b>	<b>2/19/2008</b>
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>				Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.65	0.650	mg/Kg	5	2/20/2008
<b>Phosphorus, Total (As P)</b>	<b>128</b>		<b>1.0</b>	<b>2.50</b>	<b>mg/Kg</b>	<b>5</b>	<b>2/20/2008</b>
Phosphorus, Total Orthophosphate (As P)	U		0.65	0.650	mg/Kg	5	2/20/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SiD</b>				Analyst: <b>IGF</b>
<b>Silica, Dissolved (as SiO2)</b>	<b>18.5</b>		<b>0.020</b>	<b>0.100</b>	<b>mg/kg</b>	<b>1</b>	<b>2/26/2008</b>

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-4 (13-15)  
**Collection Date:** 2/13/2008 3:37:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-05  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>MISCELLANEOUS PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
alpha-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
gamma-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
<b>ORGANOCHLORINE PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
4,4'-DDD	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDE	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDT	U		0.23	3.3	µg/Kg	1	2/24/2008
Aldrin	U		0.20	1.7	µg/Kg	1	2/24/2008
alpha-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
beta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Chlordane	U		3.0	17	µg/Kg	1	2/24/2008
delta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Dieldrin	U		0.20	3.3	µg/Kg	1	2/24/2008
Endosulfan I	U		0.20	1.7	µg/Kg	1	2/24/2008
Endosulfan II	U		0.30	3.3	µg/Kg	1	2/24/2008
Endosulfan sulfate	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin	U		0.22	3.3	µg/Kg	1	2/24/2008
Endrin aldehyde	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin ketone	U		0.25	3.3	µg/Kg	1	2/24/2008
gamma-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor epoxide	U		0.20	1.7	µg/Kg	1	2/24/2008
Methoxychlor	U		1.7	17	µg/Kg	1	2/24/2008
Toxaphene	U		5.8	17	µg/Kg	1	2/24/2008
Surr: Decachlorobiphenyl	93.2			59-144	%REC	1	2/24/2008
Surr: Tetrachloro-m-xylene	81.7			56.9-130	%REC	1	2/24/2008
<b>CHLORINATED HERBICIDES</b>							
			Method: <b>SW8151</b>		Prep: SW3550 / 2/22/08		Analyst: <b>JLJ</b>
2,4,5-T	U		0.60	3.3	µg/Kg	1	2/24/2008
2,4,5-TP (Silvex)	U		0.50	3.3	µg/Kg	1	2/24/2008
2,4-D	U		1.0	6.6	µg/Kg	1	2/24/2008
2,4-DB	U		1.7	6.6	µg/Kg	1	2/24/2008
Dalapon	U		1.6	3.3	µg/Kg	1	2/24/2008
Dicamba	U		1.5	3.3	µg/Kg	1	2/24/2008
Dichlorprop	U		3.0	6.6	µg/Kg	1	2/24/2008
Dinoseb	U		0.50	3.3	µg/Kg	1	2/24/2008
MCPA	U		150	660	µg/Kg	1	2/24/2008
MCPP	U		140	660	µg/Kg	1	2/24/2008
Surr: DCAA	35.9			30-150	%REC	1	2/24/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-4 (13-15)  
**Collection Date:** 2/13/2008 3:37:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-05  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	110			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	107			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	U		0.50	1.7	mg/Kg	1	2/22/2008
Surr: 2-Fluorobiphenyl	81.0			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	U		1.4	13.2	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/19/08		Analyst: <b>ALR</b>
Aluminum	2,740		67	180	mg/Kg	200	2/20/2008
Antimony	U		0.13	0.450	mg/Kg	1	2/19/2008
Arsenic	1.92		0.12	0.450	mg/Kg	1	2/19/2008
Barium	44.9		0.063	0.450	mg/Kg	1	2/19/2008
Beryllium	0.191	J	0.027	0.450	mg/Kg	1	2/19/2008
Boron	3.01		0.36	2.25	mg/Kg	1	2/19/2008
Cadmium	0.0601	J	0.027	0.450	mg/Kg	1	2/19/2008
Calcium	8,730		9.0	45.0	mg/Kg	1	2/19/2008
Chromium	2.99		0.063	0.450	mg/Kg	1	2/19/2008
Cobalt	0.887		0.015	0.450	mg/Kg	1	2/19/2008
Copper	1.08		0.036	0.450	mg/Kg	1	2/19/2008
Iron	2,710		4.0	45.0	mg/Kg	1	2/19/2008
Lead	2.39		0.081	0.450	mg/Kg	1	2/19/2008
Magnesium	1,300		2.3	45.0	mg/Kg	1	2/19/2008
Manganese	32.1		0.045	0.450	mg/Kg	1	2/19/2008
Molybdenum	0.186	J	0.090	0.450	mg/Kg	1	2/19/2008
Nickel	1.80		0.072	0.450	mg/Kg	1	2/19/2008
Potassium	713		2.3	45.0	mg/Kg	1	2/19/2008
Selenium	0.221	J	0.17	0.450	mg/Kg	1	2/19/2008
Silver	0.0189	J	0.018	0.450	mg/Kg	1	2/19/2008
Sodium	290		8.2	45.0	mg/Kg	1	2/19/2008
Strontium	24.7		0.090	0.450	mg/Kg	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-4 (13-15)  
**Collection Date:** 2/13/2008 3:37:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-05  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	0.0530	J	0.045	0.450	mg/Kg	1	2/19/2008
Tin	1.05	J	0.36	2.25	mg/Kg	1	2/19/2008
Titanium	58.6		0.063	0.450	mg/Kg	1	2/19/2008
Vanadium	13.0		0.050	0.450	mg/Kg	1	2/19/2008
Zinc	5.61		0.090	0.450	mg/Kg	1	2/19/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>
Lithium	U		4.7	4.72	mg/Kg	1	2/27/2008
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>		Analyst: <b>RKG</b>		
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/25/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/25/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/25/2008
Acetone	U		2.0	25	µg/Kg	1	2/25/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
Bromoform	U		0.50	10	µg/Kg	1	2/25/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/25/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/25/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/25/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/25/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/25/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/25/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/25/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/25/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-4 (13-15)  
**Collection Date:** 2/13/2008 3:37:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-05  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
<b>Dichloromethane</b>	<b>4.8</b>	<b>J</b>	<b>3.0</b>	<b>10</b>	<b>µg/Kg</b>	<b>1</b>	<b>2/25/2008</b>
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/25/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/25/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/25/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/25/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/25/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/25/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/25/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/25/2008
Surr: 1,2-Dichloroethane-d4	102			70-128	%REC	1	2/25/2008
Surr: 4-Bromofluorobenzene	100			73-126	%REC	1	2/25/2008
Surr: Dibromofluoromethane	102			71-128	%REC	1	2/25/2008
Surr: Toluene-d8	99.4			73-127	%REC	1	2/25/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/22/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/22/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
<b>Percent Moisture</b>	<b>1.95</b>		<b>0.010</b>	<b>0.0100</b>	<b>wt%</b>	<b>1</b>	<b>2/19/2008</b>
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>				Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.13	0.130	mg/Kg	1	2/20/2008
<b>Phosphorus, Total (As P)</b>	<b>19.4</b>		<b>0.20</b>	<b>0.500</b>	<b>mg/Kg</b>	<b>1</b>	<b>2/20/2008</b>
Phosphorus, Total Orthophosphate (As P)	U		0.13	0.130	mg/Kg	1	2/20/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SiD</b>				Analyst: <b>IGF</b>
<b>Silica, Dissolved (as SiO2)</b>	<b>12.3</b>		<b>0.020</b>	<b>0.100</b>	<b>mg/kg</b>	<b>1</b>	<b>2/26/2008</b>

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-4 (28-30)  
**Collection Date:** 2/13/2008 3:55:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-06  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	124			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	124			55-137	%REC	1	2/26/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	U		1.4	12.8	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/19/08		Analyst: <b>ALR</b>
Aluminum	4,360		32	87.7	mg/Kg	100	2/20/2008
Antimony	U		0.12	0.439	mg/Kg	1	2/19/2008
Arsenic	1.74		0.11	0.439	mg/Kg	1	2/19/2008
Barium	27.5		0.061	0.439	mg/Kg	1	2/19/2008
Beryllium	0.228	J	0.026	0.439	mg/Kg	1	2/19/2008
Boron	3.81		0.35	2.19	mg/Kg	1	2/19/2008
Cadmium	0.0672	J	0.026	0.439	mg/Kg	1	2/19/2008
Calcium	28,300		880	4,390	mg/Kg	100	2/20/2008
Chromium	3.10		0.061	0.439	mg/Kg	1	2/19/2008
Cobalt	1.33		0.015	0.439	mg/Kg	1	2/19/2008
Copper	1.30		0.035	0.439	mg/Kg	1	2/19/2008
Iron	3,190		3.9	43.9	mg/Kg	1	2/19/2008
Lead	2.56		0.079	0.439	mg/Kg	1	2/19/2008
Magnesium	2,350		2.3	43.9	mg/Kg	1	2/19/2008
Manganese	50.6		0.044	0.439	mg/Kg	1	2/19/2008
Molybdenum	0.177	J	0.088	0.439	mg/Kg	1	2/19/2008
Nickel	2.60		0.070	0.439	mg/Kg	1	2/19/2008
Potassium	1,190		2.3	43.9	mg/Kg	1	2/19/2008
Selenium	0.286	J	0.17	0.439	mg/Kg	1	2/19/2008
Silver	0.0201	J	0.018	0.439	mg/Kg	1	2/19/2008
Sodium	79.3		8.0	43.9	mg/Kg	1	2/19/2008
Strontium	96.4		0.088	0.439	mg/Kg	1	2/19/2008
Thallium	0.0522	J	0.044	0.439	mg/Kg	1	2/19/2008
Tin	1.07	J	0.35	2.19	mg/Kg	1	2/19/2008
Titanium	69.8		0.061	0.439	mg/Kg	1	2/19/2008
Vanadium	9.53		0.049	0.439	mg/Kg	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-4 (28-30)  
**Collection Date:** 2/13/2008 3:55:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-06  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>Zinc</b>	<b>7.45</b>		<b>0.088</b>	<b>0.439</b>	<b>mg/Kg</b>	<b>1</b>	<b>2/19/2008</b>
<b>ICP METALS, TOTAL - SW6020A</b>		Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>	
<b>Lithium</b>	<b>7.69</b>		<b>4.9</b>	<b>4.85</b>	<b>mg/Kg</b>	<b>1</b>	<b>2/27/2008</b>
<b>LOW-LEVEL TCL SEMIVOLATILE ORGANICS</b>		Method: <b>SW8270</b>		Prep: SW3541 / 2/19/08		Analyst: <b>LG</b>	
1,1'-Biphenyl	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,5-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4,6-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dichlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dimethylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2,4-Dinitrophenol	U		30	30	µg/Kg	1	2/20/2008
2,4-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2,6-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chloronaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Chlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylnaphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
2-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3&4-Methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
3,3'-Dichlorobenzidine	U		6.6	6.6	µg/Kg	1	2/20/2008
3-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4,6-Dinitro-2-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Bromophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloro-3-methylphenol	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chloroaniline	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Chlorophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/20/2008
4-Nitroaniline	U		30	30	µg/Kg	1	2/20/2008
4-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acenaphthylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Acetophenone	U		6.6	6.6	µg/Kg	1	2/20/2008
Anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Atrazine	U		6.6	6.6	µg/Kg	1	2/20/2008
Benz(a)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzaldehyde	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(a)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(b)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(g,h,i)perylene	U		6.6	6.6	µg/Kg	1	2/20/2008
Benzo(k)fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

## e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF-Shallow Borings  
 Sample ID: F14-SB-4 (28-30)  
 Collection Date: 2/13/2008 3:55:00 PM

Work Order: 0802300  
 Lab ID: 0802300-06  
 Matrix: SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Bis(2-chloroethoxy)methane	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroethyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
Bis(2-chloroisopropyl)ether	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Bis(2-ethylhexyl)phthalate</b>	<b>15</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Butyl benzyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Caprolactam</b>	<b>120</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Carbazole	U		6.6	6.6	µg/Kg	1	2/20/2008
Chrysene	U		6.6	6.6	µg/Kg	1	2/20/2008
<b>Di-n-butyl phthalate</b>	<b>13</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/20/2008
Di-n-octyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenz(a,h)anthracene	U		6.6	6.6	µg/Kg	1	2/20/2008
Dibenzofuran	U		6.6	6.6	µg/Kg	1	2/20/2008
Diethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Dimethyl phthalate	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluoranthene	U		6.6	6.6	µg/Kg	1	2/20/2008
Fluorene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorobutadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachlorocyclopentadiene	U		6.6	6.6	µg/Kg	1	2/20/2008
Hexachloroethane	U		6.6	6.6	µg/Kg	1	2/20/2008
Indeno(1,2,3-cd)pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Isophorone	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodi-n-propylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
N-Nitrosodiphenylamine	U		6.6	6.6	µg/Kg	1	2/20/2008
Naphthalene	U		6.6	6.6	µg/Kg	1	2/20/2008
Nitrobenzene	U		6.6	6.6	µg/Kg	1	2/20/2008
Pentachlorophenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenanthrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Phenol	U		6.6	6.6	µg/Kg	1	2/20/2008
Pyrene	U		6.6	6.6	µg/Kg	1	2/20/2008
Surr: 2,4,6-Tribromophenol	67.0			36-126	%REC	1	2/20/2008
Surr: 2-Fluorobiphenyl	73.5			43-125	%REC	1	2/20/2008
Surr: 2-Fluorophenol	80.9			37-125	%REC	1	2/20/2008
Surr: 4-Terphenyl-d14	95.9			32-125	%REC	1	2/20/2008
Surr: Nitrobenzene-d5	76.0			37-125	%REC	1	2/20/2008
Surr: Phenol-d6	88.6			40-125	%REC	1	2/20/2008
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>				Analyst: <b>RKG</b>
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichloro-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/25/2008

Qualifiers: U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-4 (28-30)  
**Collection Date:** 2/13/2008 3:55:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-06  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/25/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/25/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/25/2008
Acetone	U		2.0	25	µg/Kg	1	2/25/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
Bromoform	U		0.50	10	µg/Kg	1	2/25/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/25/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/25/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/25/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/25/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/25/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/25/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/25/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/25/2008
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
<b>Dichloromethane</b>	<b>6.2</b>	<b>J</b>	<b>3.0</b>	<b>10</b>	<b>µg/Kg</b>	<b>1</b>	<b>2/25/2008</b>
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/25/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/25/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/25/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/25/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/25/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/25/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**
**Date:** February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** F14-SB-4 (28-30)  
**Collection Date:** 2/13/2008 3:55:00 PM

**Work Order:** 0802300  
**Lab ID:** 0802300-06  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/25/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/25/2008
Surr: 1,2-Dichloroethane-d4	103			70-128	%REC	1	2/25/2008
Surr: 4-Bromofluorobenzene	101			73-126	%REC	1	2/25/2008
Surr: Dibromofluoromethane	101			71-128	%REC	1	2/25/2008
Surr: Toluene-d8	100			73-127	%REC	1	2/25/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/22/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/22/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
Percent Moisture	14.7		0.010	0.0100	wt%	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>				Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.13	0.130	mg/Kg	1	2/20/2008
Phosphorus, Total (As P)	41.2		0.20	0.500	mg/Kg	1	2/20/2008
Phosphorus, Total Orthophosphate (As P)	U		0.13	0.130	mg/Kg	1	2/20/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SID</b>				Analyst: <b>IGF</b>
Silica, Dissolved (as SiO2)	28.5		0.040	0.200	mg/kg	2	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
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 B - Analyte detected in the associated Method Blank E - Value above quantitation range  
 \* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** DUP-2  
**Collection Date:** 2/13/2008

**Work Order:** 0802300  
**Lab ID:** 0802300-07  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	104			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	99.1			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	0.82	J	0.50	1.7	mg/Kg	1	2/22/2008
Surr: 2-Fluorobiphenyl	79.1			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	U		1.4	13.2	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/19/08		Analyst: <b>ALR</b>
Aluminum	5,030		35	94.3	mg/Kg	100	2/20/2008
Antimony	U		0.13	0.472	mg/Kg	1	2/19/2008
Arsenic	1.92		0.12	0.472	mg/Kg	1	2/19/2008
Barium	27.6		0.066	0.472	mg/Kg	1	2/19/2008
Beryllium	0.263	J	0.028	0.472	mg/Kg	1	2/19/2008
Boron	4.62		0.38	2.36	mg/Kg	1	2/19/2008
Cadmium	0.0702	J	0.028	0.472	mg/Kg	1	2/19/2008
Calcium	24,500		940	4,720	mg/Kg	100	2/20/2008
Chromium	3.47		0.066	0.472	mg/Kg	1	2/19/2008
Cobalt	1.38		0.016	0.472	mg/Kg	1	2/19/2008
Copper	1.53		0.038	0.472	mg/Kg	1	2/19/2008
Iron	3,730		4.2	47.2	mg/Kg	1	2/19/2008
Lead	2.84		0.085	0.472	mg/Kg	1	2/19/2008
Magnesium	2,740		2.5	47.2	mg/Kg	1	2/19/2008
Manganese	56.1		0.047	0.472	mg/Kg	1	2/19/2008
Molybdenum	0.196	J	0.094	0.472	mg/Kg	1	2/19/2008
Nickel	2.96		0.075	0.472	mg/Kg	1	2/19/2008
Potassium	1,380		2.5	47.2	mg/Kg	1	2/19/2008
Selenium	0.272	J	0.18	0.472	mg/Kg	1	2/19/2008
Silver	0.0193	J	0.019	0.472	mg/Kg	1	2/19/2008
Sodium	217		8.6	47.2	mg/Kg	1	2/19/2008
Strontium	94.7		0.094	0.472	mg/Kg	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
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\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time



# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** DUP-2  
**Collection Date:** 2/13/2008

**Work Order:** 0802300  
**Lab ID:** 0802300-07  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	0.0554	J	0.047	0.472	mg/Kg	1	2/19/2008
Tin	1.11	J	0.38	2.36	mg/Kg	1	2/19/2008
Titanium	84.4		0.066	0.472	mg/Kg	1	2/19/2008
Vanadium	10.9		0.053	0.472	mg/Kg	1	2/19/2008
Zinc	8.65		0.094	0.472	mg/Kg	1	2/19/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: <b>SW6020</b>		Prep: SW3050A / 2/22/08		Analyst: <b>SA</b>
Lithium	9.97		4.9	4.90	mg/Kg	1	2/27/2008
<b>LOW-LEVEL TCL SEMIVOLATILE ORGANICS</b>			Method: <b>SW8270</b>		Prep: SW3541 / 2/19/08		Analyst: <b>LG</b>
1,1'-Biphenyl	U		6.6	6.6	µg/Kg	1	2/25/2008
2,4,5-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/25/2008
2,4,6-Trichlorophenol	U		6.6	6.6	µg/Kg	1	2/25/2008
2,4-Dichlorophenol	U		6.6	6.6	µg/Kg	1	2/25/2008
2,4-Dimethylphenol	U		6.6	6.6	µg/Kg	1	2/25/2008
2,4-Dinitrophenol	U		30	30	µg/Kg	1	2/25/2008
2,4-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/25/2008
2,6-Dinitrotoluene	U		6.6	6.6	µg/Kg	1	2/25/2008
2-Chloronaphthalene	U		6.6	6.6	µg/Kg	1	2/25/2008
2-Chlorophenol	U		6.6	6.6	µg/Kg	1	2/25/2008
2-Methylnaphthalene	U		6.6	6.6	µg/Kg	1	2/25/2008
2-Methylphenol	U		6.6	6.6	µg/Kg	1	2/25/2008
2-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/25/2008
2-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/25/2008
3&4-Methylphenol	U		6.6	6.6	µg/Kg	1	2/25/2008
3,3'-Dichlorobenzidine	U		6.6	6.6	µg/Kg	1	2/25/2008
3-Nitroaniline	U		6.6	6.6	µg/Kg	1	2/25/2008
4,6-Dinitro-2-methylphenol	U		6.6	6.6	µg/Kg	1	2/25/2008
4-Bromophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/25/2008
4-Chloro-3-methylphenol	U		6.6	6.6	µg/Kg	1	2/25/2008
4-Chloroaniline	U		6.6	6.6	µg/Kg	1	2/25/2008
4-Chlorophenyl phenyl ether	U		6.6	6.6	µg/Kg	1	2/25/2008
4-Nitroaniline	U		30	30	µg/Kg	1	2/25/2008
4-Nitrophenol	U		6.6	6.6	µg/Kg	1	2/25/2008
Acenaphthene	U		6.6	6.6	µg/Kg	1	2/25/2008
Acenaphthylene	U		6.6	6.6	µg/Kg	1	2/25/2008
Acetophenone	U		6.6	6.6	µg/Kg	1	2/25/2008
Anthracene	U		6.6	6.6	µg/Kg	1	2/25/2008
Atrazine	U		6.6	6.6	µg/Kg	1	2/25/2008
Benz(a)anthracene	U		6.6	6.6	µg/Kg	1	2/25/2008
Benzaldehyde	U		6.6	6.6	µg/Kg	1	2/25/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** DUP-2  
**Collection Date:** 2/13/2008

**Work Order:** 0802300  
**Lab ID:** 0802300-07  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Benzo(a)pyrene	U		6.6	6.6	µg/Kg	1	2/25/2008
Benzo(b)fluoranthene	U		6.6	6.6	µg/Kg	1	2/25/2008
Benzo(g,h,i)perylene	U		6.6	6.6	µg/Kg	1	2/25/2008
Benzo(k)fluoranthene	U		6.6	6.6	µg/Kg	1	2/25/2008
Bis(2-chloroethoxy)methane	U		6.6	6.6	µg/Kg	1	2/25/2008
Bis(2-chloroethyl)ether	U		6.6	6.6	µg/Kg	1	2/25/2008
Bis(2-chloroisopropyl)ether	U		6.6	6.6	µg/Kg	1	2/25/2008
<b>Bis(2-ethylhexyl)phthalate</b>	<b>13</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/25/2008
Butyl benzyl phthalate	U		6.6	6.6	µg/Kg	1	2/25/2008
Caprolactam	U		6.6	6.6	µg/Kg	1	2/25/2008
Carbazole	U		6.6	6.6	µg/Kg	1	2/25/2008
Chrysene	U		6.6	6.6	µg/Kg	1	2/25/2008
<b>Di-n-butyl phthalate</b>	<b>11</b>		<b>6.6</b>	<b>6.6</b>	<b>µg/Kg</b>	1	2/25/2008
Di-n-octyl phthalate	U		6.6	6.6	µg/Kg	1	2/25/2008
Dibenz(a,h)anthracene	U		6.6	6.6	µg/Kg	1	2/25/2008
Dibenzofuran	U		6.6	6.6	µg/Kg	1	2/25/2008
Diethyl phthalate	U		6.6	6.6	µg/Kg	1	2/25/2008
Dimethyl phthalate	U		6.6	6.6	µg/Kg	1	2/25/2008
Fluoranthene	U		6.6	6.6	µg/Kg	1	2/25/2008
Fluorene	U		6.6	6.6	µg/Kg	1	2/25/2008
Hexachlorobenzene	U		6.6	6.6	µg/Kg	1	2/25/2008
Hexachlorobutadiene	U		6.6	6.6	µg/Kg	1	2/25/2008
Hexachlorocyclopentadiene	U		6.6	6.6	µg/Kg	1	2/25/2008
Hexachloroethane	U		6.6	6.6	µg/Kg	1	2/25/2008
Indeno(1,2,3-cd)pyrene	U		6.6	6.6	µg/Kg	1	2/25/2008
Isophorone	U		6.6	6.6	µg/Kg	1	2/25/2008
N-Nitrosodi-n-propylamine	U		6.6	6.6	µg/Kg	1	2/25/2008
N-Nitrosodiphenylamine	U		6.6	6.6	µg/Kg	1	2/25/2008
Naphthalene	U		6.6	6.6	µg/Kg	1	2/25/2008
Nitrobenzene	U		6.6	6.6	µg/Kg	1	2/25/2008
Pentachlorophenol	U		6.6	6.6	µg/Kg	1	2/25/2008
Phenanthrene	U		6.6	6.6	µg/Kg	1	2/25/2008
Phenol	U		6.6	6.6	µg/Kg	1	2/25/2008
Pyrene	U		6.6	6.6	µg/Kg	1	2/25/2008
Surr: 2,4,6-Tribromophenol	76.5			36-126	%REC	1	2/25/2008
Surr: 2-Fluorobiphenyl	81.9			43-125	%REC	1	2/25/2008
Surr: 2-Fluorophenol	70.8			37-125	%REC	1	2/25/2008
Surr: 4-Terphenyl-d14	82.3			32-125	%REC	1	2/25/2008
Surr: Nitrobenzene-d5	70.8			37-125	%REC	1	2/25/2008
Surr: Phenol-d6	78.1			40-125	%REC	1	2/25/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** DUP-2  
**Collection Date:** 2/13/2008

**Work Order:** 0802300  
**Lab ID:** 0802300-07  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>			Analyst: <b>RKG</b>	
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/25/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/25/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/25/2008
Acetone	U		2.0	25	µg/Kg	1	2/25/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
Bromoform	U		0.50	10	µg/Kg	1	2/25/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/25/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/25/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/25/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/25/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/25/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/25/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/25/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/25/2008
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
<b>Dichloromethane</b>	<b>4.5</b>	<b>J</b>	<b>3.0</b>	<b>10</b>	<b>µg/Kg</b>	<b>1</b>	<b>2/25/2008</b>
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/25/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/25/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/25/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/25/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** DUP-2  
**Collection Date:** 2/13/2008

**Work Order:** 0802300  
**Lab ID:** 0802300-07  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Styrene	U		0.70	5.0	µg/Kg	1	2/25/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/25/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/25/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/25/2008
Surr: 1,2-Dichloroethane-d4	99.2			70-128	%REC	1	2/25/2008
Surr: 4-Bromofluorobenzene	98.3			73-126	%REC	1	2/25/2008
Surr: Dibromofluoromethane	100			71-128	%REC	1	2/25/2008
Surr: Toluene-d8	99.2			73-127	%REC	1	2/25/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/22/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/22/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
Percent Moisture	<b>2.94</b>		<b>0.010</b>	<b>0.0100</b>	wt%	1	2/19/2008
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>				Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.65	0.650	mg/Kg	5	2/20/2008
Phosphorus, Total (As P)	<b>59.0</b>		<b>1.0</b>	<b>2.50</b>	mg/Kg	5	2/20/2008
Phosphorus, Total Orthophosphate (As P)	U		0.65	0.650	mg/Kg	5	2/20/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SID</b>				Analyst: <b>IGF</b>
Silica, Dissolved (as SiO2)	<b>20.1</b>		<b>0.040</b>	<b>0.200</b>	mg/kg	2	2/26/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** DUP-3  
**Collection Date:** 2/13/2008

**Work Order:** 0802300  
**Lab ID:** 0802300-08  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>MISCELLANEOUS PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
alpha-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
gamma-Chlordane	U		0.20	1.7	µg/Kg	1	2/24/2008
<b>ORGANOCHLORINE PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
4,4'-DDD	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDE	U		0.20	3.3	µg/Kg	1	2/24/2008
4,4'-DDT	U		0.23	3.3	µg/Kg	1	2/24/2008
Aldrin	U		0.20	1.7	µg/Kg	1	2/24/2008
alpha-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
beta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Chlordane	U		3.0	17	µg/Kg	1	2/24/2008
delta-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Dieldrin	U		0.20	3.3	µg/Kg	1	2/24/2008
Endosulfan I	U		0.20	1.7	µg/Kg	1	2/24/2008
Endosulfan II	U		0.30	3.3	µg/Kg	1	2/24/2008
Endosulfan sulfate	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin	U		0.22	3.3	µg/Kg	1	2/24/2008
Endrin aldehyde	U		0.30	3.3	µg/Kg	1	2/24/2008
Endrin ketone	U		0.25	3.3	µg/Kg	1	2/24/2008
gamma-BHC	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor	U		0.20	1.7	µg/Kg	1	2/24/2008
Heptachlor epoxide	U		0.20	1.7	µg/Kg	1	2/24/2008
Methoxychlor	U		1.7	17	µg/Kg	1	2/24/2008
Toxaphene	U		5.8	17	µg/Kg	1	2/24/2008
Surr: Decachlorobiphenyl	95.4			59-144	%REC	1	2/24/2008
Surr: Tetrachloro-m-xylene	87.4			56.9-130	%REC	1	2/24/2008
<b>CHLORINATED HERBICIDES</b>							
			Method: <b>SW8151</b>		Prep: SW3550 / 2/22/08		Analyst: <b>JLJ</b>
2,4,5-T	U		0.60	3.3	µg/Kg	1	2/24/2008
2,4,5-TP (Silvex)	U		0.50	3.3	µg/Kg	1	2/24/2008
2,4-D	U		1.0	6.6	µg/Kg	1	2/24/2008
2,4-DB	U		1.7	6.6	µg/Kg	1	2/24/2008
Dalapon	U		1.6	3.3	µg/Kg	1	2/24/2008
Dicamba	U		1.5	3.3	µg/Kg	1	2/24/2008
Dichlorprop	U		3.0	6.6	µg/Kg	1	2/24/2008
Dinoseb	U		0.50	3.3	µg/Kg	1	2/24/2008
MCPA	U		150	660	µg/Kg	1	2/24/2008
MCPP	U		140	660	µg/Kg	1	2/24/2008
Surr: DCAA	107			30-150	%REC	1	2/24/2008

**Qualifiers:** U - Analyzed for but Not Detected

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S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** DUP-3  
**Collection Date:** 2/13/2008

**Work Order:** 0802300  
**Lab ID:** 0802300-08  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3541 / 2/20/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1221	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1232	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1242	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1248	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1254	U		3.0	17	µg/Kg	1	2/26/2008
Aroclor 1260	U		3.0	17	µg/Kg	1	2/26/2008
Surr: Decachlorobiphenyl	115			54-143	%REC	1	2/26/2008
Surr: Tetrachloro-m-xylene	113			55-137	%REC	1	2/26/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3541 / 2/21/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	U		0.50	1.7	mg/Kg	1	2/28/2008
Surr: 2-Fluorobiphenyl	78.6			70-130	%REC	1	2/28/2008
<b>MERCURY, TOTAL</b>							
			Method: <b>SW7471A</b>		Prep: SW7471A / 2/25/08		Analyst: <b>JCJ</b>
Mercury	U		1.4	13.2	µg/Kg	1	2/25/2008
<b>ICP METALS - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3050A / 2/19/08		Analyst: <b>ALR</b>
Aluminum	5,830		34	90.9	mg/Kg	100	2/20/2008
Antimony	U		0.13	0.455	mg/Kg	1	2/19/2008
Arsenic	4.08		0.12	0.455	mg/Kg	1	2/19/2008
Barium	83.7		0.064	0.455	mg/Kg	1	2/19/2008
Beryllium	0.337	J	0.027	0.455	mg/Kg	1	2/19/2008
Boron	6.67		0.36	2.27	mg/Kg	1	2/19/2008
Cadmium	0.0790	J	0.027	0.455	mg/Kg	1	2/19/2008
Calcium	29,400		910	4,550	mg/Kg	100	2/20/2008
Chromium	4.18		0.064	0.455	mg/Kg	1	2/19/2008
Cobalt	2.15		0.015	0.455	mg/Kg	1	2/19/2008
Copper	2.14		0.036	0.455	mg/Kg	1	2/19/2008
Iron	5,080		4.0	45.5	mg/Kg	1	2/19/2008
Lead	3.76		0.082	0.455	mg/Kg	1	2/19/2008
Magnesium	3,720		2.4	45.5	mg/Kg	1	2/19/2008
Manganese	85.0		0.045	0.455	mg/Kg	1	2/19/2008
Molybdenum	0.214	J	0.091	0.455	mg/Kg	1	2/19/2008
Nickel	3.59		0.073	0.455	mg/Kg	1	2/19/2008
Potassium	1,610		2.4	45.5	mg/Kg	1	2/19/2008
Selenium	0.344	J	0.17	0.455	mg/Kg	1	2/19/2008
Silver	U		0.018	0.455	mg/Kg	1	2/19/2008
Sodium	452		8.3	45.5	mg/Kg	1	2/19/2008
Strontium	110		0.091	0.455	mg/Kg	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
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B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** DUP-3  
**Collection Date:** 2/13/2008

**Work Order:** 0802300  
**Lab ID:** 0802300-08  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Thallium	0.0589	J	0.045	0.455	mg/Kg	1	2/19/2008
Tin	0.992	J	0.36	2.27	mg/Kg	1	2/19/2008
Titanium	118		0.064	0.455	mg/Kg	1	2/19/2008
Vanadium	23.0		0.051	0.455	mg/Kg	1	2/19/2008
Zinc	11.9		0.091	0.455	mg/Kg	1	2/19/2008
<b>ICP METALS, TOTAL - SW6020A</b>			Method: SW6020		Prep: SW3050A / 2/22/08		Analyst: SA
Lithium	8.79		4.8	4.81	mg/Kg	1	2/27/2008
<b>TCL VOLATILE ORGANICS</b>			Method: SW8260				Analyst: RKG
1,1,1-Trichloroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2,2-Tetrachloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		0.70	5.0	µg/Kg	1	2/25/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,1-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dibromo-3-chloropropane	U		0.80	5.0	µg/Kg	1	2/25/2008
1,2-Dibromoethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichlorobenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloroethane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,2-Dichloropropane	U		0.60	5.0	µg/Kg	1	2/25/2008
1,3-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
2-Butanone	U		0.70	10	µg/Kg	1	2/25/2008
2-Hexanone	U		1.0	10	µg/Kg	1	2/25/2008
4-Methyl-2-pentanone	U		1.0	10	µg/Kg	1	2/25/2008
Acetone	U		2.0	25	µg/Kg	1	2/25/2008
Benzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Bromodichloromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
Bromoform	U		0.50	10	µg/Kg	1	2/25/2008
Bromomethane	U		1.0	10	µg/Kg	1	2/25/2008
Carbon disulfide	U		1.2	10	µg/Kg	1	2/25/2008
Carbon tetrachloride	U		1.0	5.0	µg/Kg	1	2/25/2008
Chlorobenzene	U		0.70	5.0	µg/Kg	1	2/25/2008
Chloroethane	U		1.6	10	µg/Kg	1	2/25/2008
Chloroform	U		0.90	5.0	µg/Kg	1	2/25/2008
Chloromethane	U		1.1	10	µg/Kg	1	2/25/2008
cis-1,2-Dichloroethene	U		0.80	5.0	µg/Kg	1	2/25/2008
cis-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Cyclohexane	U		1.0	5.0	µg/Kg	1	2/25/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** DUP-3  
**Collection Date:** 2/13/2008

**Work Order:** 0802300  
**Lab ID:** 0802300-08  
**Matrix:** SOIL

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Dibromochloromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Dichlorodifluoromethane	U		0.80	5.0	µg/Kg	1	2/25/2008
<b>Dichloromethane</b>	<b>5.2</b>	<b>J</b>	<b>3.0</b>	<b>10</b>	<b>µg/Kg</b>	<b>1</b>	<b>2/25/2008</b>
Ethylbenzene	U		0.80	5.0	µg/Kg	1	2/25/2008
Isopropylbenzene	U		0.60	5.0	µg/Kg	1	2/25/2008
Methyl acetate	U		1.0	5.0	µg/Kg	1	2/25/2008
Methyl tert-butyl ether	U		0.80	5.0	µg/Kg	1	2/25/2008
Methylcyclohexane	U		0.80	5.0	µg/Kg	1	2/25/2008
Styrene	U		0.70	5.0	µg/Kg	1	2/25/2008
Tetrachloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Toluene	U		0.60	5.0	µg/Kg	1	2/25/2008
trans-1,2-Dichloroethene	U		1.0	5.0	µg/Kg	1	2/25/2008
trans-1,3-Dichloropropene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichloroethene	U		0.60	5.0	µg/Kg	1	2/25/2008
Trichlorofluoromethane	U		0.60	5.0	µg/Kg	1	2/25/2008
Vinyl chloride	U		0.60	2.0	µg/Kg	1	2/25/2008
Xylenes, Total	U		1.5	15	µg/Kg	1	2/25/2008
Surr: 1,2-Dichloroethane-d4	96.9			70-128	%REC	1	2/25/2008
Surr: 4-Bromofluorobenzene	98.4			73-126	%REC	1	2/25/2008
Surr: Dibromofluoromethane	100			71-128	%REC	1	2/25/2008
Surr: Toluene-d8	98.6			73-127	%REC	1	2/25/2008
<b>CYANIDE, TOTAL</b>			Method: <b>SW9014</b>				Analyst: <b>RPM</b>
Cyanide	U		0.60	2.00	mg/Kg	1	2/22/2008
Cyanide, Amenable to Chlorination	U		0.60	2.00	mg/Kg	1	2/22/2008
<b>PERCENT MOISTURE</b>			Method: <b>E160.3</b>				Analyst: <b>TL</b>
<b>Percent Moisture</b>	<b>7.04</b>		<b>0.010</b>	<b>0.0100</b>	<b>wt%</b>	<b>1</b>	<b>2/19/2008</b>
<b>PHOSPHORUS, TOTAL</b>			Method: <b>E365.3</b>				Analyst: <b>DM</b>
Phosphorus, Dissolved (As P)	U		0.65	0.650	mg/Kg	5	2/20/2008
<b>Phosphorus, Total (As P)</b>	<b>158</b>		<b>1.0</b>	<b>2.50</b>	<b>mg/Kg</b>	<b>5</b>	<b>2/20/2008</b>
Phosphorus, Total Orthophosphate (As P)	U		0.65	0.650	mg/Kg	5	2/20/2008
<b>SILICA AS SiO2, SOLUBLE</b>			Method: <b>SM4500-SiD</b>				Analyst: <b>IGF</b>
<b>Silica, Dissolved (as SiO2)</b>	<b>11.9</b>		<b>0.020</b>	<b>0.100</b>	<b>mg/kg</b>	<b>1</b>	<b>2/26/2008</b>

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time



## e-Lab Analytical, Inc.

Date: February 28, 2008

Client: Malcolm Pirnie, Inc.  
 Project: Oro Grande LF-Shallow Borings  
 Sample ID: Rinsate-1  
 Collection Date: 2/14/2008 8:30:00 AM

Work Order: 0802300  
 Lab ID: 0802300-09  
 Matrix: WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>MISCELLANEOUS PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3510B / 2/19/08		Analyst: <b>JLJ</b>
alpha-Chlordane	U		0.010	0.050	µg/L	1	2/19/2008
gamma-Chlordane	U		0.010	0.050	µg/L	1	2/19/2008
<b>ORGANOCHLORINE PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3510B / 2/19/08		Analyst: <b>JLJ</b>
4,4'-DDD	U		0.012	0.10	µg/L	1	2/19/2008
4,4'-DDE	U		0.010	0.10	µg/L	1	2/19/2008
4,4'-DDT	U		0.011	0.10	µg/L	1	2/19/2008
Aldrin	U		0.010	0.050	µg/L	1	2/19/2008
alpha-BHC	U		0.010	0.050	µg/L	1	2/19/2008
beta-BHC	U		0.010	0.050	µg/L	1	2/19/2008
Chlordane	U		0.030	0.50	µg/L	1	2/19/2008
<b>delta-BHC</b>	<b>0.066</b>		<b>0.010</b>	<b>0.050</b>	<b>µg/L</b>	1	2/19/2008
Dieldrin	U		0.010	0.10	µg/L	1	2/19/2008
Endosulfan I	U		0.010	0.050	µg/L	1	2/19/2008
Endosulfan II	U		0.011	0.10	µg/L	1	2/19/2008
Endosulfan sulfate	U		0.012	0.10	µg/L	1	2/19/2008
Endrin	U		0.012	0.10	µg/L	1	2/19/2008
Endrin aldehyde	U		0.013	0.10	µg/L	1	2/19/2008
Endrin ketone	U		0.010	0.10	µg/L	1	2/19/2008
gamma-BHC	U		0.010	0.050	µg/L	1	2/19/2008
Heptachlor	U		0.010	0.050	µg/L	1	2/19/2008
Heptachlor epoxide	U		0.010	0.050	µg/L	1	2/19/2008
Methoxychlor	U		0.080	0.50	µg/L	1	2/19/2008
Toxaphene	U		0.20	0.50	µg/L	1	2/19/2008
Surr: Decachlorobiphenyl	106			54.9-145	%REC	1	2/19/2008
Surr: Tetrachloro-m-xylene	101			51.5-142	%REC	1	2/19/2008
<b>CHLORINATED HERBICIDES</b>							
			Method: <b>SW8151</b>		Prep: SW3510B / 2/19/08		Analyst: <b>JLJ</b>
2,4,5-T	U		0.050	0.10	µg/L	1	2/20/2008
2,4,5-TP (Silvex)	U		0.020	0.10	µg/L	1	2/20/2008
2,4-D	U		0.080	0.20	µg/L	1	2/20/2008
2,4-DB	U		0.070	0.20	µg/L	1	2/20/2008
Dalapon	U		0.050	0.10	µg/L	1	2/20/2008
Dicamba	U		0.050	0.10	µg/L	1	2/20/2008
Dichlorprop	U		0.070	0.20	µg/L	1	2/20/2008
Dinoseb	U		0.030	0.10	µg/L	1	2/20/2008
MCPA	U		3.0	20	µg/L	1	2/20/2008
MCPP	U		7.0	20	µg/L	1	2/20/2008
Surr: DCAA	95.4			50-130	%REC	1	2/20/2008

Qualifiers: U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** Rinsate-1  
**Collection Date:** 2/14/2008 8:30:00 AM

**Work Order:** 0802300  
**Lab ID:** 0802300-09  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3510B / 2/19/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1221	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1232	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1242	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1248	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1254	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1260	U		0.20	0.500	µg/L	1	2/19/2008
Surr: Decachlorobiphenyl	112			54-140	%REC	1	2/19/2008
Surr: Tetrachloro-m-xylene	109			53-137	%REC	1	2/19/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3510C / 2/19/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	U		0.020	0.050	mg/L	1	2/22/2008
Surr: 2-Fluorobiphenyl	80.3			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL - SW 7470A</b>							
			Method: <b>SW7470</b>		Prep: SW7470 / 2/20/08		Analyst: <b>JCJ</b>
Mercury	U		0.000042	0.000200	mg/L	1	2/20/2008
<b>ICP METALS, TOTAL - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3010A / 2/20/08		Analyst: <b>ALR</b>
Arsenic	U		0.0018	0.00500	mg/L	1	2/20/2008
Barium	U		0.00060	0.00500	mg/L	1	2/20/2008
Cadmium	U		0.00015	0.00200	mg/L	1	2/20/2008
Chromium	U		0.00050	0.00500	mg/L	1	2/20/2008
Lead	U		0.00020	0.00500	mg/L	1	2/20/2008
Selenium	0.00179	J	0.0017	0.00500	mg/L	1	2/20/2008
Silver	U		0.00020	0.00500	mg/L	1	2/20/2008
<b>LOW-LEVEL TCL SEMIVOLATILE ORGANICS</b>							
			Method: <b>SW8270</b>		Prep: SW3510 / 2/19/08		Analyst: <b>LG</b>
1,1'-Biphenyl	U		0.20	0.20	µg/L	1	2/20/2008
2,4,5-Trichlorophenol	U		0.060	0.20	µg/L	1	2/20/2008
2,4,6-Trichlorophenol	U		0.070	0.20	µg/L	1	2/20/2008
2,4-Dichlorophenol	U		0.090	0.20	µg/L	1	2/20/2008
2,4-Dimethylphenol	U		0.080	0.20	µg/L	1	2/20/2008
2,4-Dinitrophenol	U		1.0	1.0	µg/L	1	2/20/2008
2,4-Dinitrotoluene	U		0.060	0.20	µg/L	1	2/20/2008
2,6-Dinitrotoluene	U		0.070	0.20	µg/L	1	2/20/2008
2-Chloronaphthalene	U		0.070	0.20	µg/L	1	2/20/2008
2-Chlorophenol	U		0.090	0.20	µg/L	1	2/20/2008
2-Methylnaphthalene	U		0.090	0.20	µg/L	1	2/20/2008
2-Methylphenol	U		0.10	0.20	µg/L	1	2/20/2008
2-Nitroaniline	U		0.070	0.20	µg/L	1	2/20/2008
2-Nitrophenol	U		0.070	0.20	µg/L	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** Rinsate-1  
**Collection Date:** 2/14/2008 8:30:00 AM

**Work Order:** 0802300  
**Lab ID:** 0802300-09  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
3&4-Methylphenol	U		0.10	0.20	µg/L	1	2/20/2008
3,3'-Dichlorobenzidine	U		0.070	0.20	µg/L	1	2/20/2008
3-Nitroaniline	U		0.050	0.20	µg/L	1	2/20/2008
4,6-Dinitro-2-methylphenol	U		0.060	0.20	µg/L	1	2/20/2008
4-Bromophenyl phenyl ether	U		0.11	0.20	µg/L	1	2/20/2008
4-Chloro-3-methylphenol	U		0.10	0.20	µg/L	1	2/20/2008
4-Chloroaniline	U		0.050	0.20	µg/L	1	2/20/2008
4-Chlorophenyl phenyl ether	U		0.060	0.20	µg/L	1	2/20/2008
4-Nitroaniline	U		0.050	0.20	µg/L	1	2/20/2008
4-Nitrophenol	U		0.060	1.0	µg/L	1	2/20/2008
Acenaphthene	U		0.070	0.20	µg/L	1	2/20/2008
Acenaphthylene	U		0.080	0.20	µg/L	1	2/20/2008
Acetophenone	U		0.20	0.20	µg/L	1	2/20/2008
Anthracene	U		0.080	0.20	µg/L	1	2/20/2008
Atrazine	U		0.20	0.20	µg/L	1	2/20/2008
Benz(a)anthracene	U		0.070	0.20	µg/L	1	2/20/2008
Benzaldehyde	U		0.20	0.20	µg/L	1	2/20/2008
Benzo(a)pyrene	U		0.080	0.20	µg/L	1	2/20/2008
Benzo(b)fluoranthene	U		0.070	0.20	µg/L	1	2/20/2008
Benzo(g,h,i)perylene	U		0.11	0.20	µg/L	1	2/20/2008
Benzo(k)fluoranthene	U		0.070	0.20	µg/L	1	2/20/2008
Bis(2-chloroethoxy)methane	U		0.080	0.20	µg/L	1	2/20/2008
Bis(2-chloroethyl)ether	U		0.080	0.20	µg/L	1	2/20/2008
Bis(2-chloroisopropyl)ether	U		0.090	0.20	µg/L	1	2/20/2008
<b>Bis(2-ethylhexyl)phthalate</b>	<b>1.5</b>		<b>0.11</b>	<b>0.20</b>	<b>µg/L</b>	1	2/20/2008
Butyl benzyl phthalate	U		0.090	0.20	µg/L	1	2/20/2008
Caprolactam	U		0.20	0.20	µg/L	1	2/20/2008
Carbazole	U		0.080	0.20	µg/L	1	2/20/2008
Chrysene	U		0.090	0.20	µg/L	1	2/20/2008
Di-n-butyl phthalate	U		0.11	0.20	µg/L	1	2/20/2008
Di-n-octyl phthalate	U		0.070	0.20	µg/L	1	2/20/2008
Dibenz(a,h)anthracene	U		0.090	0.20	µg/L	1	2/20/2008
Dibenzofuran	U		0.070	0.20	µg/L	1	2/20/2008
Diethyl phthalate	U		0.060	0.20	µg/L	1	2/20/2008
Dimethyl phthalate	U		0.060	0.20	µg/L	1	2/20/2008
Fluoranthene	U		0.090	0.20	µg/L	1	2/20/2008
Fluorene	U		0.070	0.20	µg/L	1	2/20/2008
Hexachlorobenzene	U		0.10	0.20	µg/L	1	2/20/2008
Hexachlorobutadiene	U		0.070	0.20	µg/L	1	2/20/2008
Hexachlorocyclopentadiene	U		0.070	0.20	µg/L	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected  
J - Analyte detected below quantitation limits  
B - Analyte detected in the associated Method Blank  
\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits  
P - Dual Column results RPD > 40%  
E - Value above quantitation range  
H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** Rinsate-1  
**Collection Date:** 2/14/2008 8:30:00 AM

**Work Order:** 0802300  
**Lab ID:** 0802300-09  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Hexachloroethane	U		0.090	0.20	µg/L	1	2/20/2008
Indeno(1,2,3-cd)pyrene	U		0.060	0.20	µg/L	1	2/20/2008
Isophorone	U		0.080	0.20	µg/L	1	2/20/2008
N-Nitrosodi-n-propylamine	U		0.10	0.20	µg/L	1	2/20/2008
N-Nitrosodiphenylamine	U		0.080	0.20	µg/L	1	2/20/2008
Naphthalene	U		0.070	0.20	µg/L	1	2/20/2008
Nitrobenzene	U		0.070	0.20	µg/L	1	2/20/2008
Pentachlorophenol	U		0.070	0.20	µg/L	1	2/20/2008
Phenanthrene	U		0.080	0.20	µg/L	1	2/20/2008
Phenol	U		0.090	0.20	µg/L	1	2/20/2008
Pyrene	U		0.090	0.20	µg/L	1	2/20/2008
Surr: 2,4,6-Tribromophenol	61.4			34-129	%REC	1	2/20/2008
Surr: 2-Fluorobiphenyl	75.7			48-115	%REC	1	2/20/2008
Surr: 2-Fluorophenol	64.0			32-115	%REC	1	2/20/2008
Surr: 4-Terphenyl-d14	77.4			44-117	%REC	1	2/20/2008
Surr: Nitrobenzene-d5	69.1			44-115	%REC	1	2/20/2008
Surr: Phenol-d6	75.8			21-119	%REC	1	2/20/2008

## TCL VOLATILE ORGANICS

Method: SW8260

Analyst: PC

1,1,1-Trichloroethane	U		0.60	5.0	µg/L	1	2/19/2008
1,1,2,2-Tetrachloroethane	U		1.5	5.0	µg/L	1	2/19/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		1.0	5.0	µg/L	1	2/19/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,1-Dichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,1-Dichloroethene	U		0.60	5.0	µg/L	1	2/19/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/L	1	2/19/2008
1,2-Dibromo-3-chloropropane	U		1.8	5.0	µg/L	1	2/19/2008
1,2-Dibromoethane	U		0.50	5.0	µg/L	1	2/19/2008
1,2-Dichlorobenzene	U		0.90	5.0	µg/L	1	2/19/2008
1,2-Dichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,2-Dichloropropane	U		0.70	5.0	µg/L	1	2/19/2008
1,3-Dichlorobenzene	U		1.0	5.0	µg/L	1	2/19/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/L	1	2/19/2008
2-Butanone	U		0.80	10	µg/L	1	2/19/2008
2-Hexanone	U		2.5	10	µg/L	1	2/19/2008
4-Methyl-2-pentanone	U		1.6	10	µg/L	1	2/19/2008
Acetone	U		2.5	10	µg/L	1	2/19/2008
Benzene	U		0.60	5.0	µg/L	1	2/19/2008
Bromodichloromethane	U		0.50	5.0	µg/L	1	2/19/2008
Bromoform	U		0.80	5.0	µg/L	1	2/19/2008
Bromomethane	U		0.50	5.0	µg/L	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** Rinsate-1  
**Collection Date:** 2/14/2008 8:30:00 AM

**Work Order:** 0802300  
**Lab ID:** 0802300-09  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Carbon disulfide	U		0.70	10	µg/L	1	2/19/2008
Carbon tetrachloride	U		0.60	5.0	µg/L	1	2/19/2008
Chlorobenzene	U		0.50	5.0	µg/L	1	2/19/2008
Chloroethane	U		0.60	5.0	µg/L	1	2/19/2008
Chloroform	U		0.50	5.0	µg/L	1	2/19/2008
Chloromethane	U		0.50	5.0	µg/L	1	2/19/2008
cis-1,2-Dichloroethene	U		0.50	5.0	µg/L	1	2/19/2008
cis-1,3-Dichloropropene	U		0.50	5.0	µg/L	1	2/19/2008
Cyclohexane	U		0.80	5.0	µg/L	1	2/19/2008
Dibromochloromethane	U		0.50	5.0	µg/L	1	2/19/2008
Dichlorodifluoromethane	U		0.50	5.0	µg/L	1	2/19/2008
Dichloromethane	U		0.60	10	µg/L	1	2/19/2008
Ethylbenzene	U		0.50	5.0	µg/L	1	2/19/2008
Isopropylbenzene	U		0.70	5.0	µg/L	1	2/19/2008
Methyl acetate	U		2.0	5.0	µg/L	1	2/19/2008
Methyl tert-butyl ether	U		0.50	5.0	µg/L	1	2/19/2008
Methylcyclohexane	U		0.70	5.0	µg/L	1	2/19/2008
Styrene	U		0.50	5.0	µg/L	1	2/19/2008
Tetrachloroethene	U		0.50	5.0	µg/L	1	2/19/2008
Toluene	U		0.50	5.0	µg/L	1	2/19/2008
trans-1,2-Dichloroethene	U		0.60	5.0	µg/L	1	2/19/2008
trans-1,3-Dichloropropene	U		0.50	5.0	µg/L	1	2/19/2008
Trichloroethene	U		0.70	5.0	µg/L	1	2/19/2008
Trichlorofluoromethane	U		0.50	5.0	µg/L	1	2/19/2008
Vinyl chloride	U		0.60	2.0	µg/L	1	2/19/2008
Xylenes, Total	U		1.5	15	µg/L	1	2/19/2008
Surr: 1,2-Dichloroethane-d4	81.6			70-125	%REC	1	2/19/2008
Surr: 4-Bromofluorobenzene	80.7			72-125	%REC	1	2/19/2008
Surr: Dibromofluoromethane	83.3			71-125	%REC	1	2/19/2008
Surr: Toluene-d8	86.7			75-125	%REC	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** Rinsate-2  
**Collection Date:** 2/14/2008 9:00:00 AM

**Work Order:** 0802300  
**Lab ID:** 0802300-10  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>MISCELLANEOUS PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3510B / 2/19/08		Analyst: <b>JLJ</b>
alpha-Chlordane	U		0.010	0.050	µg/L	1	2/19/2008
gamma-Chlordane	U		0.010	0.050	µg/L	1	2/19/2008
<b>ORGANOCHLORINE PESTICIDES</b>							
			Method: <b>SW8081</b>		Prep: SW3510B / 2/19/08		Analyst: <b>JLJ</b>
4,4'-DDD	U		0.012	0.10	µg/L	1	2/19/2008
4,4'-DDE	U		0.010	0.10	µg/L	1	2/19/2008
4,4'-DDT	U		0.011	0.10	µg/L	1	2/19/2008
Aldrin	U		0.010	0.050	µg/L	1	2/19/2008
alpha-BHC	U		0.010	0.050	µg/L	1	2/19/2008
beta-BHC	U		0.010	0.050	µg/L	1	2/19/2008
Chlordane	U		0.030	0.50	µg/L	1	2/19/2008
delta-BHC	U		0.010	0.050	µg/L	1	2/19/2008
Dieldrin	U		0.010	0.10	µg/L	1	2/19/2008
Endosulfan I	U		0.010	0.050	µg/L	1	2/19/2008
Endosulfan II	U		0.011	0.10	µg/L	1	2/19/2008
Endosulfan sulfate	U		0.012	0.10	µg/L	1	2/19/2008
Endrin	U		0.012	0.10	µg/L	1	2/19/2008
Endrin aldehyde	U		0.013	0.10	µg/L	1	2/19/2008
Endrin ketone	U		0.010	0.10	µg/L	1	2/19/2008
gamma-BHC	U		0.010	0.050	µg/L	1	2/19/2008
Heptachlor	U		0.010	0.050	µg/L	1	2/19/2008
Heptachlor epoxide	U		0.010	0.050	µg/L	1	2/19/2008
Methoxychlor	U		0.080	0.50	µg/L	1	2/19/2008
Toxaphene	U		0.20	0.50	µg/L	1	2/19/2008
Surr: Decachlorobiphenyl	95.7			54.9-145	%REC	1	2/19/2008
Surr: Tetrachloro-m-xylene	89.9			51.5-142	%REC	1	2/19/2008
<b>CHLORINATED HERBICIDES</b>							
			Method: <b>SW8151</b>		Prep: SW3510B / 2/19/08		Analyst: <b>JLJ</b>
2,4,5-T	U		0.050	0.10	µg/L	1	2/20/2008
2,4,5-TP (Silvex)	U		0.020	0.10	µg/L	1	2/20/2008
2,4-D	U		0.080	0.20	µg/L	1	2/20/2008
2,4-DB	U		0.070	0.20	µg/L	1	2/20/2008
Dalapon	U		0.050	0.10	µg/L	1	2/20/2008
Dicamba	U		0.050	0.10	µg/L	1	2/20/2008
Dichlorprop	U		0.070	0.20	µg/L	1	2/20/2008
Dinoseb	U		0.030	0.10	µg/L	1	2/20/2008
MCPA	U		3.0	20	µg/L	1	2/20/2008
MCPP	U		7.0	20	µg/L	1	2/20/2008
Surr: DCAA	95.2			50-130	%REC	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD > 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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## e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** Rinsate-2  
**Collection Date:** 2/14/2008 9:00:00 AM

**Work Order:** 0802300  
**Lab ID:** 0802300-10  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>PCBS</b>							
			Method: <b>SW8082</b>		Prep: SW3510B / 2/19/08		Analyst: <b>JLJ</b>
Aroclor 1016	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1221	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1232	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1242	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1248	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1254	U		0.20	0.500	µg/L	1	2/19/2008
Aroclor 1260	U		0.20	0.500	µg/L	1	2/19/2008
Surr: Decachlorobiphenyl	105			54-140	%REC	1	2/19/2008
Surr: Tetrachloro-m-xylene	101			53-137	%REC	1	2/19/2008
<b>MODIFIED 8015 TPH</b>							
			Method: <b>SW8015M</b>		Prep: SW3510C / 2/19/08		Analyst: <b>JFT</b>
TPH (Diesel Range)	U		0.020	0.050	mg/L	1	2/22/2008
Surr: 2-Fluorobiphenyl	72.2			70-130	%REC	1	2/22/2008
<b>MERCURY, TOTAL - SW 7470A</b>							
			Method: <b>SW7470</b>		Prep: SW7470 / 2/20/08		Analyst: <b>JCJ</b>
Mercury	U		0.000042	0.000200	mg/L	1	2/20/2008
<b>ICP METALS, TOTAL - SW6020A</b>							
			Method: <b>SW6020</b>		Prep: SW3010A / 2/20/08		Analyst: <b>ALR</b>
Arsenic	U		0.0018	0.00500	mg/L	1	2/20/2008
Barium	U		0.00060	0.00500	mg/L	1	2/20/2008
Cadmium	U		0.00015	0.00200	mg/L	1	2/20/2008
Chromium	U		0.00050	0.00500	mg/L	1	2/20/2008
Lead	U		0.00020	0.00500	mg/L	1	2/20/2008
Selenium	U		0.0017	0.00500	mg/L	1	2/20/2008
Silver	U		0.00020	0.00500	mg/L	1	2/20/2008
<b>LOW-LEVEL TCL SEMIVOLATILE ORGANICS</b>							
			Method: <b>SW8270</b>		Prep: SW3510 / 2/19/08		Analyst: <b>LG</b>
1,1'-Biphenyl	U		0.20	0.20	µg/L	1	2/20/2008
2,4,5-Trichlorophenol	U		0.060	0.20	µg/L	1	2/20/2008
2,4,6-Trichlorophenol	U		0.070	0.20	µg/L	1	2/20/2008
2,4-Dichlorophenol	U		0.090	0.20	µg/L	1	2/20/2008
2,4-Dimethylphenol	U		0.080	0.20	µg/L	1	2/20/2008
2,4-Dinitrophenol	U		1.0	1.0	µg/L	1	2/20/2008
2,4-Dinitrotoluene	U		0.060	0.20	µg/L	1	2/20/2008
2,6-Dinitrotoluene	U		0.070	0.20	µg/L	1	2/20/2008
2-Chloronaphthalene	U		0.070	0.20	µg/L	1	2/20/2008
2-Chlorophenol	U		0.090	0.20	µg/L	1	2/20/2008
2-Methylnaphthalene	U		0.090	0.20	µg/L	1	2/20/2008
2-Methylphenol	U		0.10	0.20	µg/L	1	2/20/2008
2-Nitroaniline	U		0.070	0.20	µg/L	1	2/20/2008
2-Nitrophenol	U		0.070	0.20	µg/L	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** Rinsate-2  
**Collection Date:** 2/14/2008 9:00:00 AM

**Work Order:** 0802300  
**Lab ID:** 0802300-10  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
3&4-Methylphenol	U		0.10	0.20	µg/L	1	2/20/2008
3,3'-Dichlorobenzidine	U		0.070	0.20	µg/L	1	2/20/2008
3-Nitroaniline	U		0.050	0.20	µg/L	1	2/20/2008
4,6-Dinitro-2-methylphenol	U		0.060	0.20	µg/L	1	2/20/2008
4-Bromophenyl phenyl ether	U		0.11	0.20	µg/L	1	2/20/2008
4-Chloro-3-methylphenol	U		0.10	0.20	µg/L	1	2/20/2008
4-Chloroaniline	U		0.050	0.20	µg/L	1	2/20/2008
4-Chlorophenyl phenyl ether	U		0.060	0.20	µg/L	1	2/20/2008
4-Nitroaniline	U		0.050	0.20	µg/L	1	2/20/2008
4-Nitrophenol	U		0.060	1.0	µg/L	1	2/20/2008
Acenaphthene	U		0.070	0.20	µg/L	1	2/20/2008
Acenaphthylene	U		0.080	0.20	µg/L	1	2/20/2008
Acetophenone	U		0.20	0.20	µg/L	1	2/20/2008
Anthracene	U		0.080	0.20	µg/L	1	2/20/2008
Atrazine	U		0.20	0.20	µg/L	1	2/20/2008
Benz(a)anthracene	U		0.070	0.20	µg/L	1	2/20/2008
Benzaldehyde	U		0.20	0.20	µg/L	1	2/20/2008
Benzo(a)pyrene	U		0.080	0.20	µg/L	1	2/20/2008
Benzo(b)fluoranthene	U		0.070	0.20	µg/L	1	2/20/2008
Benzo(g,h,i)perylene	U		0.11	0.20	µg/L	1	2/20/2008
Benzo(k)fluoranthene	U		0.070	0.20	µg/L	1	2/20/2008
Bis(2-chloroethoxy)methane	U		0.080	0.20	µg/L	1	2/20/2008
Bis(2-chloroethyl)ether	U		0.080	0.20	µg/L	1	2/20/2008
Bis(2-chloroisopropyl)ether	U		0.090	0.20	µg/L	1	2/20/2008
<b>Bis(2-ethylhexyl)phthalate</b>	<b>0.46</b>		<b>0.11</b>	<b>0.20</b>	<b>µg/L</b>	1	2/20/2008
Butyl benzyl phthalate	U		0.090	0.20	µg/L	1	2/20/2008
Caprolactam	U		0.20	0.20	µg/L	1	2/20/2008
Carbazole	U		0.080	0.20	µg/L	1	2/20/2008
Chrysene	U		0.090	0.20	µg/L	1	2/20/2008
Di-n-butyl phthalate	U		0.11	0.20	µg/L	1	2/20/2008
Di-n-octyl phthalate	U		0.070	0.20	µg/L	1	2/20/2008
Dibenz(a,h)anthracene	U		0.090	0.20	µg/L	1	2/20/2008
Dibenzofuran	U		0.070	0.20	µg/L	1	2/20/2008
Diethyl phthalate	U		0.060	0.20	µg/L	1	2/20/2008
Dimethyl phthalate	U		0.060	0.20	µg/L	1	2/20/2008
Fluoranthene	U		0.090	0.20	µg/L	1	2/20/2008
Fluorene	U		0.070	0.20	µg/L	1	2/20/2008
Hexachlorobenzene	U		0.10	0.20	µg/L	1	2/20/2008
Hexachlorobutadiene	U		0.070	0.20	µg/L	1	2/20/2008
Hexachlorocyclopentadiene	U		0.070	0.20	µg/L	1	2/20/2008

**Qualifiers:** U - Analyzed for but Not Detected  
J - Analyte detected below quantitation limits  
B - Analyte detected in the associated Method Blank  
\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits  
P - Dual Column results RPD > 40%  
E - Value above quantitation range  
H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** Rinsate-2  
**Collection Date:** 2/14/2008 9:00:00 AM

**Work Order:** 0802300  
**Lab ID:** 0802300-10  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Hexachloroethane	U		0.090	0.20	µg/L	1	2/20/2008
Indeno(1,2,3-cd)pyrene	U		0.060	0.20	µg/L	1	2/20/2008
Isophorone	U		0.080	0.20	µg/L	1	2/20/2008
N-Nitrosodi-n-propylamine	U		0.10	0.20	µg/L	1	2/20/2008
N-Nitrosodiphenylamine	U		0.080	0.20	µg/L	1	2/20/2008
Naphthalene	U		0.070	0.20	µg/L	1	2/20/2008
Nitrobenzene	U		0.070	0.20	µg/L	1	2/20/2008
Pentachlorophenol	U		0.070	0.20	µg/L	1	2/20/2008
Phenanthrene	U		0.080	0.20	µg/L	1	2/20/2008
Phenol	U		0.090	0.20	µg/L	1	2/20/2008
Pyrene	U		0.090	0.20	µg/L	1	2/20/2008
Surr: 2,4,6-Tribromophenol	72.4			34-129	%REC	1	2/20/2008
Surr: 2-Fluorobiphenyl	77.0			48-115	%REC	1	2/20/2008
Surr: 2-Fluorophenol	56.5			32-115	%REC	1	2/20/2008
Surr: 4-Terphenyl-d14	89.5			44-117	%REC	1	2/20/2008
Surr: Nitrobenzene-d5	65.6			44-115	%REC	1	2/20/2008
Surr: Phenol-d6	69.4			21-119	%REC	1	2/20/2008

**TCL VOLATILE ORGANICS**

Method: SW8260

Analyst: PC

1,1,1-Trichloroethane	U	0.60	5.0	µg/L	1	2/19/2008
1,1,2,2-Tetrachloroethane	U	1.5	5.0	µg/L	1	2/19/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U	1.0	5.0	µg/L	1	2/19/2008
1,1,2-Trichloroethane	U	0.50	5.0	µg/L	1	2/19/2008
1,1-Dichloroethane	U	0.50	5.0	µg/L	1	2/19/2008
1,1-Dichloroethene	U	0.60	5.0	µg/L	1	2/19/2008
1,2,4-Trichlorobenzene	U	0.60	5.0	µg/L	1	2/19/2008
1,2-Dibromo-3-chloropropane	U	1.8	5.0	µg/L	1	2/19/2008
1,2-Dibromoethane	U	0.50	5.0	µg/L	1	2/19/2008
1,2-Dichlorobenzene	U	0.90	5.0	µg/L	1	2/19/2008
1,2-Dichloroethane	U	0.50	5.0	µg/L	1	2/19/2008
1,2-Dichloropropane	U	0.70	5.0	µg/L	1	2/19/2008
1,3-Dichlorobenzene	U	1.0	5.0	µg/L	1	2/19/2008
1,4-Dichlorobenzene	U	0.70	5.0	µg/L	1	2/19/2008
2-Butanone	U	0.80	10	µg/L	1	2/19/2008
2-Hexanone	U	2.5	10	µg/L	1	2/19/2008
4-Methyl-2-pentanone	U	1.6	10	µg/L	1	2/19/2008
Acetone	U	2.5	10	µg/L	1	2/19/2008
Benzene	U	0.60	5.0	µg/L	1	2/19/2008
Bromodichloromethane	U	0.50	5.0	µg/L	1	2/19/2008
Bromoform	U	0.80	5.0	µg/L	1	2/19/2008
Bromomethane	U	0.50	5.0	µg/L	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected

S - Spike Recovery outside accepted recovery limits

J - Analyte detected below quantitation limits

P - Dual Column results RPD &gt; 40%

B - Analyte detected in the associated Method Blank

E - Value above quantitation range

\* - Value exceeds Maximum Contaminant Level

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** Rinsate-2  
**Collection Date:** 2/14/2008 9:00:00 AM

**Work Order:** 0802300  
**Lab ID:** 0802300-10  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Carbon disulfide	U		0.70	10	µg/L	1	2/19/2008
Carbon tetrachloride	U		0.60	5.0	µg/L	1	2/19/2008
Chlorobenzene	U		0.50	5.0	µg/L	1	2/19/2008
Chloroethane	U		0.60	5.0	µg/L	1	2/19/2008
Chloroform	U		0.50	5.0	µg/L	1	2/19/2008
Chloromethane	U		0.50	5.0	µg/L	1	2/19/2008
cis-1,2-Dichloroethene	U		0.50	5.0	µg/L	1	2/19/2008
cis-1,3-Dichloropropene	U		0.50	5.0	µg/L	1	2/19/2008
Cyclohexane	U		0.80	5.0	µg/L	1	2/19/2008
Dibromochloromethane	U		0.50	5.0	µg/L	1	2/19/2008
Dichlorodifluoromethane	U		0.50	5.0	µg/L	1	2/19/2008
Dichloromethane	U		0.60	10	µg/L	1	2/19/2008
Ethylbenzene	U		0.50	5.0	µg/L	1	2/19/2008
Isopropylbenzene	U		0.70	5.0	µg/L	1	2/19/2008
Methyl acetate	U		2.0	5.0	µg/L	1	2/19/2008
Methyl tert-butyl ether	U		0.50	5.0	µg/L	1	2/19/2008
Methylcyclohexane	U		0.70	5.0	µg/L	1	2/19/2008
Styrene	U		0.50	5.0	µg/L	1	2/19/2008
Tetrachloroethene	U		0.50	5.0	µg/L	1	2/19/2008
Toluene	U		0.50	5.0	µg/L	1	2/19/2008
trans-1,2-Dichloroethene	U		0.60	5.0	µg/L	1	2/19/2008
trans-1,3-Dichloropropene	U		0.50	5.0	µg/L	1	2/19/2008
Trichloroethene	U		0.70	5.0	µg/L	1	2/19/2008
Trichlorofluoromethane	U		0.50	5.0	µg/L	1	2/19/2008
Vinyl chloride	U		0.60	2.0	µg/L	1	2/19/2008
Xylenes, Total	U		1.5	15	µg/L	1	2/19/2008
Surr: 1,2-Dichloroethane-d4	88.9			70-125	%REC	1	2/19/2008
Surr: 4-Bromofluorobenzene	83.5			72-125	%REC	1	2/19/2008
Surr: Dibromofluoromethane	91.7			71-125	%REC	1	2/19/2008
Surr: Toluene-d8	91.9			75-125	%REC	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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# e-Lab Analytical, Inc.

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** Trip Blank 1  
**Collection Date:** 2/14/2008 9:00:00 AM

**Work Order:** 0802300  
**Lab ID:** 0802300-11  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>			Analyst: <b>PC</b>	
1,1,1-Trichloroethane	U		0.60	5.0	µg/L	1	2/19/2008
1,1,2,2-Tetrachloroethane	U		1.5	5.0	µg/L	1	2/19/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		1.0	5.0	µg/L	1	2/19/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,1-Dichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,1-Dichloroethene	U		0.60	5.0	µg/L	1	2/19/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/L	1	2/19/2008
1,2-Dibromo-3-chloropropane	U		1.8	5.0	µg/L	1	2/19/2008
1,2-Dibromoethane	U		0.50	5.0	µg/L	1	2/19/2008
1,2-Dichlorobenzene	U		0.90	5.0	µg/L	1	2/19/2008
1,2-Dichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,2-Dichloropropane	U		0.70	5.0	µg/L	1	2/19/2008
1,3-Dichlorobenzene	U		1.0	5.0	µg/L	1	2/19/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/L	1	2/19/2008
2-Butanone	U		0.80	10	µg/L	1	2/19/2008
2-Hexanone	U		2.5	10	µg/L	1	2/19/2008
4-Methyl-2-pentanone	U		1.6	10	µg/L	1	2/19/2008
Acetone	U		2.5	10	µg/L	1	2/19/2008
Benzene	U		0.60	5.0	µg/L	1	2/19/2008
Bromodichloromethane	U		0.50	5.0	µg/L	1	2/19/2008
Bromoform	U		0.80	5.0	µg/L	1	2/19/2008
Bromomethane	U		0.50	5.0	µg/L	1	2/19/2008
Carbon disulfide	U		0.70	10	µg/L	1	2/19/2008
Carbon tetrachloride	U		0.60	5.0	µg/L	1	2/19/2008
Chlorobenzene	U		0.50	5.0	µg/L	1	2/19/2008
Chloroethane	U		0.60	5.0	µg/L	1	2/19/2008
Chloroform	U		0.50	5.0	µg/L	1	2/19/2008
Chloromethane	U		0.50	5.0	µg/L	1	2/19/2008
cis-1,2-Dichloroethene	U		0.50	5.0	µg/L	1	2/19/2008
cis-1,3-Dichloropropene	U		0.50	5.0	µg/L	1	2/19/2008
Cyclohexane	U		0.80	5.0	µg/L	1	2/19/2008
Dibromochloromethane	U		0.50	5.0	µg/L	1	2/19/2008
Dichlorodifluoromethane	U		0.50	5.0	µg/L	1	2/19/2008
Dichloromethane	U		0.60	10	µg/L	1	2/19/2008
Ethylbenzene	U		0.50	5.0	µg/L	1	2/19/2008
Isopropylbenzene	U		0.70	5.0	µg/L	1	2/19/2008
Methyl acetate	U		2.0	5.0	µg/L	1	2/19/2008
Methyl tert-butyl ether	U		0.50	5.0	µg/L	1	2/19/2008
Methylcyclohexane	U		0.70	5.0	µg/L	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected S - Spike Recovery outside accepted recovery limits  
J - Analyte detected below quantitation limits P - Dual Column results RPD > 40%  
B - Analyte detected in the associated Method Blank E - Value above quantitation range  
\* - Value exceeds Maximum Contaminant Level H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** Trip Blank 1  
**Collection Date:** 2/14/2008 9:00:00 AM

**Work Order:** 0802300  
**Lab ID:** 0802300-11  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Styrene	U		0.50	5.0	µg/L	1	2/19/2008
Tetrachloroethene	U		0.50	5.0	µg/L	1	2/19/2008
Toluene	U		0.50	5.0	µg/L	1	2/19/2008
trans-1,2-Dichloroethene	U		0.60	5.0	µg/L	1	2/19/2008
trans-1,3-Dichloropropene	U		0.50	5.0	µg/L	1	2/19/2008
Trichloroethene	U		0.70	5.0	µg/L	1	2/19/2008
Trichlorofluoromethane	U		0.50	5.0	µg/L	1	2/19/2008
Vinyl chloride	U		0.60	2.0	µg/L	1	2/19/2008
Xylenes, Total	U		1.5	15	µg/L	1	2/19/2008
Surr: 1,2-Dichloroethane-d4	88.6			70-125	%REC	1	2/19/2008
Surr: 4-Bromofluorobenzene	82.3			72-125	%REC	1	2/19/2008
Surr: Dibromofluoromethane	93.8			71-125	%REC	1	2/19/2008
Surr: Toluene-d8	91.4			75-125	%REC	1	2/19/2008

**Qualifiers:**

U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** Trip Blank 2  
**Collection Date:** 2/14/2008 9:00:00 AM

**Work Order:** 0802300  
**Lab ID:** 0802300-12  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>				Analyst: <b>PC</b>
1,1,1-Trichloroethane	U		0.60	5.0	µg/L	1	2/19/2008
1,1,2,2-Tetrachloroethane	U		1.5	5.0	µg/L	1	2/19/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		1.0	5.0	µg/L	1	2/19/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,1-Dichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,1-Dichloroethene	U		0.60	5.0	µg/L	1	2/19/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/L	1	2/19/2008
1,2-Dibromo-3-chloropropane	U		1.8	5.0	µg/L	1	2/19/2008
1,2-Dibromoethane	U		0.50	5.0	µg/L	1	2/19/2008
1,2-Dichlorobenzene	U		0.90	5.0	µg/L	1	2/19/2008
1,2-Dichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,2-Dichloropropane	U		0.70	5.0	µg/L	1	2/19/2008
1,3-Dichlorobenzene	U		1.0	5.0	µg/L	1	2/19/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/L	1	2/19/2008
2-Butanone	U		0.80	10	µg/L	1	2/19/2008
2-Hexanone	U		2.5	10	µg/L	1	2/19/2008
4-Methyl-2-pentanone	U		1.6	10	µg/L	1	2/19/2008
Acetone	U		2.5	10	µg/L	1	2/19/2008
Benzene	U		0.60	5.0	µg/L	1	2/19/2008
Bromodichloromethane	U		0.50	5.0	µg/L	1	2/19/2008
Bromoform	U		0.80	5.0	µg/L	1	2/19/2008
Bromomethane	U		0.50	5.0	µg/L	1	2/19/2008
Carbon disulfide	U		0.70	10	µg/L	1	2/19/2008
Carbon tetrachloride	U		0.60	5.0	µg/L	1	2/19/2008
Chlorobenzene	U		0.50	5.0	µg/L	1	2/19/2008
Chloroethane	U		0.60	5.0	µg/L	1	2/19/2008
Chloroform	U		0.50	5.0	µg/L	1	2/19/2008
Chloromethane	U		0.50	5.0	µg/L	1	2/19/2008
cis-1,2-Dichloroethene	U		0.50	5.0	µg/L	1	2/19/2008
cis-1,3-Dichloropropene	U		0.50	5.0	µg/L	1	2/19/2008
Cyclohexane	U		0.80	5.0	µg/L	1	2/19/2008
Dibromochloromethane	U		0.50	5.0	µg/L	1	2/19/2008
Dichlorodifluoromethane	U		0.50	5.0	µg/L	1	2/19/2008
Dichloromethane	U		0.60	10	µg/L	1	2/19/2008
Ethylbenzene	U		0.50	5.0	µg/L	1	2/19/2008
Isopropylbenzene	U		0.70	5.0	µg/L	1	2/19/2008
Methyl acetate	U		2.0	5.0	µg/L	1	2/19/2008
Methyl tert-butyl ether	U		0.50	5.0	µg/L	1	2/19/2008
Methylcyclohexane	U		0.70	5.0	µg/L	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.****Date:** February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** Trip Blank 2  
**Collection Date:** 2/14/2008 9:00:00 AM

**Work Order:** 0802300  
**Lab ID:** 0802300-12  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Styrene	U		0.50	5.0	µg/L	1	2/19/2008
Tetrachloroethene	U		0.50	5.0	µg/L	1	2/19/2008
Toluene	U		0.50	5.0	µg/L	1	2/19/2008
trans-1,2-Dichloroethene	U		0.60	5.0	µg/L	1	2/19/2008
trans-1,3-Dichloropropene	U		0.50	5.0	µg/L	1	2/19/2008
Trichloroethene	U		0.70	5.0	µg/L	1	2/19/2008
Trichlorofluoromethane	U		0.50	5.0	µg/L	1	2/19/2008
Vinyl chloride	U		0.60	2.0	µg/L	1	2/19/2008
Xylenes, Total	U		1.5	15	µg/L	1	2/19/2008
Surr: 1,2-Dichloroethane-d4	85.8			70-125	%REC	1	2/19/2008
Surr: 4-Bromofluorobenzene	82.7			72-125	%REC	1	2/19/2008
Surr: Dibromofluoromethane	87.6			71-125	%REC	1	2/19/2008
Surr: Toluene-d8	91.3			75-125	%REC	1	2/19/2008

**Qualifiers:**

U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.**

Date: February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** Trip Blank 3  
**Collection Date:** 2/14/2008 9:00:00 AM

**Work Order:** 0802300  
**Lab ID:** 0802300-13  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
<b>TCL VOLATILE ORGANICS</b>			Method: <b>SW8260</b>			Analyst: <b>PC</b>	
1,1,1-Trichloroethane	U		0.60	5.0	µg/L	1	2/19/2008
1,1,2,2-Tetrachloroethane	U		1.5	5.0	µg/L	1	2/19/2008
1,1,2-Trichlor-1,2,2-trifluoroethane	U		1.0	5.0	µg/L	1	2/19/2008
1,1,2-Trichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,1-Dichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,1-Dichloroethene	U		0.60	5.0	µg/L	1	2/19/2008
1,2,4-Trichlorobenzene	U		0.60	5.0	µg/L	1	2/19/2008
1,2-Dibromo-3-chloropropane	U		1.8	5.0	µg/L	1	2/19/2008
1,2-Dibromoethane	U		0.50	5.0	µg/L	1	2/19/2008
1,2-Dichlorobenzene	U		0.90	5.0	µg/L	1	2/19/2008
1,2-Dichloroethane	U		0.50	5.0	µg/L	1	2/19/2008
1,2-Dichloropropane	U		0.70	5.0	µg/L	1	2/19/2008
1,3-Dichlorobenzene	U		1.0	5.0	µg/L	1	2/19/2008
1,4-Dichlorobenzene	U		0.70	5.0	µg/L	1	2/19/2008
2-Butanone	U		0.80	10	µg/L	1	2/19/2008
2-Hexanone	U		2.5	10	µg/L	1	2/19/2008
4-Methyl-2-pentanone	U		1.6	10	µg/L	1	2/19/2008
Acetone	U		2.5	10	µg/L	1	2/19/2008
Benzene	U		0.60	5.0	µg/L	1	2/19/2008
Bromodichloromethane	U		0.50	5.0	µg/L	1	2/19/2008
Bromoform	U		0.80	5.0	µg/L	1	2/19/2008
Bromomethane	U		0.50	5.0	µg/L	1	2/19/2008
Carbon disulfide	U		0.70	10	µg/L	1	2/19/2008
Carbon tetrachloride	U		0.60	5.0	µg/L	1	2/19/2008
Chlorobenzene	U		0.50	5.0	µg/L	1	2/19/2008
Chloroethane	U		0.60	5.0	µg/L	1	2/19/2008
Chloroform	U		0.50	5.0	µg/L	1	2/19/2008
Chloromethane	U		0.50	5.0	µg/L	1	2/19/2008
cis-1,2-Dichloroethene	U		0.50	5.0	µg/L	1	2/19/2008
cis-1,3-Dichloropropene	U		0.50	5.0	µg/L	1	2/19/2008
Cyclohexane	U		0.80	5.0	µg/L	1	2/19/2008
Dibromochloromethane	U		0.50	5.0	µg/L	1	2/19/2008
Dichlorodifluoromethane	U		0.50	5.0	µg/L	1	2/19/2008
Dichloromethane	U		0.60	10	µg/L	1	2/19/2008
Ethylbenzene	U		0.50	5.0	µg/L	1	2/19/2008
Isopropylbenzene	U		0.70	5.0	µg/L	1	2/19/2008
Methyl acetate	U		2.0	5.0	µg/L	1	2/19/2008
Methyl tert-butyl ether	U		0.50	5.0	µg/L	1	2/19/2008
Methylcyclohexane	U		0.70	5.0	µg/L	1	2/19/2008

**Qualifiers:** U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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**e-Lab Analytical, Inc.****Date:** February 28, 2008

**Client:** Malcolm Pirnie, Inc.  
**Project:** Oro Grande LF-Shallow Borings  
**Sample ID:** Trip Blank 3  
**Collection Date:** 2/14/2008 9:00:00 AM

**Work Order:** 0802300  
**Lab ID:** 0802300-13  
**Matrix:** WATER

Analyses	Result	Qual	MDL	Report Limit	Units	Dilution Factor	Date Analyzed
Styrene	U		0.50	5.0	µg/L	1	2/19/2008
Tetrachloroethene	U		0.50	5.0	µg/L	1	2/19/2008
Toluene	U		0.50	5.0	µg/L	1	2/19/2008
trans-1,2-Dichloroethene	U		0.60	5.0	µg/L	1	2/19/2008
trans-1,3-Dichloropropene	U		0.50	5.0	µg/L	1	2/19/2008
Trichloroethene	U		0.70	5.0	µg/L	1	2/19/2008
Trichlorofluoromethane	U		0.50	5.0	µg/L	1	2/19/2008
Vinyl chloride	U		0.60	2.0	µg/L	1	2/19/2008
Xylenes, Total	U		1.5	15	µg/L	1	2/19/2008
Surr: 1,2-Dichloroethane-d4	86.6			70-125	%REC	1	2/19/2008
Surr: 4-Bromofluorobenzene	83.4			72-125	%REC	1	2/19/2008
Surr: Dibromofluoromethane	89.6			71-125	%REC	1	2/19/2008
Surr: Toluene-d8	90.7			75-125	%REC	1	2/19/2008

**Qualifiers:**

U - Analyzed for but Not Detected

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

\* - Value exceeds Maximum Contaminant Level

S - Spike Recovery outside accepted recovery limits

P - Dual Column results RPD &gt; 40%

E - Value above quantitation range

H - Analyzed outside of Hold Time

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## e-Lab Analytical, Inc.

Date: Feb 28 2008

CLIENT: Malcolm Pirnie, Inc.

## QC BATCH REPORT

Work Order: 0802300

Project: Oro Grande LF-Shallow Borings

Batch ID: 28296

Instrument ID ECD\_1

Method: SW8081

MBLK		Sample ID: PBLKW1-080219			Units: µg/L		Analysis Date: 02/19/08 20:17			
Client ID:		Run ID: ECD_1_080218E			SeqNo: 1335914		Prep Date: 2/19/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	U	0.10								
4,4'-DDE	U	0.10								
4,4'-DDT	U	0.10								
Aldrin	U	0.050								
alpha-BHC	U	0.050								
beta-BHC	U	0.050								
Chlordane	U	0.50								
delta-BHC	U	0.050								
Dieldrin	U	0.10								
Endosulfan I	U	0.050								
Endosulfan II	U	0.10								
Endosulfan sulfate	U	0.10								
Endrin	U	0.10								
Endrin aldehyde	U	0.10								
Endrin ketone	U	0.10								
gamma-BHC	U	0.050								
Heptachlor	U	0.050								
Heptachlor epoxide	U	0.050								
Methoxychlor	U	0.50								
Toxaphene	U	0.50								
Surr: Decachlorobiphenyl	0.1662	0.10	0.2	0	83.1	54.9-145	0			
Surr: Tetrachloro-m-xylene	0.1544	0.050	0.2	0	77.2	51.5-142	0			

MBLK		Sample ID: PBLKW1-080219			Units: µg/L		Analysis Date: 02/19/08 20:17			
Client ID:		Run ID: ECD_1_080218E			SeqNo: 1335920		Prep Date: 2/19/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	U	0.050								
gamma-Chlordane	U	0.050								

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is &gt; 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference &gt; 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 1 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: **28296** Instrument ID **ECD\_1** Method: **SW8081**

LCS		Sample ID: <b>PLCSW1-080219</b>			Units: <b>µg/L</b>			Analysis Date: <b>02/19/08 20:51</b>		
Client ID:		Run ID: <b>ECD_1_080218E</b>			SeqNo: <b>1335915</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	0.4044	0.10	0.5	0	80.9	53-144	0			
4,4'-DDE	0.3997	0.10	0.5	0	79.9	55-144	0			
4,4'-DDT	0.3832	0.10	0.5	0	76.6	53-149	0			
Aldrin	0.1928	0.050	0.25	0	77.1	47-141	0			
alpha-BHC	0.2031	0.050	0.25	0	81.2	51-141	0			
beta-BHC	0.1995	0.050	0.25	0	79.8	58-144	0			
delta-BHC	0.1974	0.050	0.25	0	79	48-146	0			
Dieldrin	0.408	0.10	0.5	0	81.6	56-144	0			
Endosulfan I	0.2034	0.050	0.25	0	81.4	55-141	0			
Endosulfan II	0.4053	0.10	0.5	0	81.1	57-144	0			
Endosulfan sulfate	0.4111	0.10	0.5	0	82.2	58-145	0			
Endrin	0.4687	0.10	0.5	0	93.7	60-163	0			
Endrin aldehyde	0.4371	0.10	0.5	0	87.4	59-158	0			
Endrin ketone	0.4268	0.10	0.5	0	85.4	59-154	0			
gamma-BHC	0.2047	0.050	0.25	0	81.9	53-142	0			
Heptachlor	0.2069	0.050	0.25	0	82.7	51-144	0			
Heptachlor epoxide	0.1987	0.050	0.25	0	79.5	55-142	0			
Methoxychlor	2.113	0.50	2.5	0	84.5	59-150	0			
<i>Surr: Decachlorobiphenyl</i>	<i>0.1757</i>	<i>0.10</i>	<i>0.2</i>	<i>0</i>	<i>87.9</i>	<i>61-154</i>	<i>0</i>			
<i>Surr: Tetrachloro-m-xylene</i>	<i>0.1654</i>	<i>0.050</i>	<i>0.2</i>	<i>0</i>	<i>82.7</i>	<i>60-144</i>	<i>0</i>			

LCS		Sample ID: <b>PLCSW1-080219</b>			Units: <b>µg/L</b>			Analysis Date: <b>02/19/08 20:51</b>		
Client ID:		Run ID: <b>ECD_1_080218E</b>			SeqNo: <b>1335921</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	0.1979	0.050	0.25	0	79.2	55-141	0			
gamma-Chlordane	0.1963	0.050	0.25	0	78.5	55-137	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28296** Instrument ID **ECD\_1** Method: **SW8081**

LCSD		Sample ID: <b>PLCSDW1-080219</b>			Units: <b>µg/L</b>			Analysis Date: <b>02/19/08 21:25</b>		
Client ID:		Run ID: <b>ECD_1_080218E</b>			SeqNo: <b>1335916</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	0.5056	0.10	0.5	0	101	53-144	0.4044	22.2	30	
4,4'-DDE	0.5071	0.10	0.5	0	101	55-144	0.3997	23.7	30	
4,4'-DDT	0.4779	0.10	0.5	0	95.6	53-149	0.3832	22	30	
Aldrin	0.239	0.050	0.25	0	95.6	47-141	0.1928	21.4	30	
alpha-BHC	0.25	0.050	0.25	0	100	51-141	0.2031	20.7	30	
beta-BHC	0.2452	0.050	0.25	0	98.1	58-144	0.1995	20.6	30	
delta-BHC	0.242	0.050	0.25	0	96.8	48-146	0.1974	20.3	30	
Dieldrin	0.5086	0.10	0.5	0	102	56-144	0.408	22	30	
Endosulfan I	0.2536	0.050	0.25	0	101	55-141	0.2034	22	30	
Endosulfan II	0.4995	0.10	0.5	0	99.9	57-144	0.4053	20.8	30	
Endosulfan sulfate	0.5106	0.10	0.5	0	102	58-145	0.4111	21.6	30	
Endrin	0.5844	0.10	0.5	0	117	60-163	0.4687	22	30	
Endrin aldehyde	0.5357	0.10	0.5	0	107	59-158	0.4371	20.3	30	
Endrin ketone	0.5316	0.10	0.5	0	106	59-154	0.4268	21.9	30	
gamma-BHC	0.2516	0.050	0.25	0	101	53-142	0.2047	20.5	30	
Heptachlor	0.255	0.050	0.25	0	102	51-144	0.2069	20.9	30	
Heptachlor epoxide	0.2442	0.050	0.25	0	97.7	55-142	0.1987	20.6	30	
Methoxychlor	2.592	0.50	2.5	0	104	59-150	2.113	20.4	30	
<i>Surr: Decachlorobiphenyl</i>	0.2138	0.10	0.2	0	107	61-154	0.1757	19.5	30	
<i>Surr: Tetrachloro-m-xylene</i>	0.2033	0.050	0.2	0	102	60-144	0.1654	20.5	30	

LCSD		Sample ID: <b>PLCSDW1-080219</b>			Units: <b>µg/L</b>			Analysis Date: <b>02/19/08 21:25</b>		
Client ID:		Run ID: <b>ECD_1_080218E</b>			SeqNo: <b>1335922</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	0.2437	0.050	0.25	0	97.5	55-141	0.1979	20.8	30	
gamma-Chlordane	0.2407	0.050	0.25	0	96.3	55-137	0.1963	20.4	30	

The following samples were analyzed in this batch:

0802300-09E 0802300-10E

ND - Not Detected at the Reporting Limit  
J - Analyte detected below quantitation limits  
O - Referenced analyte value is > 4 times amount spiked  
S - Spike Recovery outside accepted recovery limits  
R - RPD outside accepted recovery limits  
P - Dual Column results percent difference > 40%  
B - Analyte detected in assoc. Method Blank  
U - Analyzed for but not detected  
E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: **28297** Instrument ID **ECD\_7** Method: **SW8082**

<b>MBLK</b>		Sample ID: <b>PBLKW2-080219</b>			Units: <b>µg/L</b>			Analysis Date: <b>02/19/08 13:38</b>		
Client ID:		Run ID: <b>ECD_7_080218D</b>			SeqNo: <b>1335937</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	U	0.50								
Aroclor 1221	U	0.50								
Aroclor 1232	U	0.50								
Aroclor 1242	U	0.50								
Aroclor 1248	U	0.50								
Aroclor 1254	U	0.50								
Aroclor 1260	U	0.50								
<i>Surr: Decachlorobiphenyl</i>	0.1974	0.050	0.2	0	98.7	54-140	0			
<i>Surr: Tetrachloro-m-xylene</i>	0.2036	0.050	0.2	0	102	53-137	0			

<b>LCS</b>		Sample ID: <b>PLCSW2-080219</b>			Units: <b>µg/L</b>			Analysis Date: <b>02/19/08 15:21</b>		
Client ID:		Run ID: <b>ECD_7_080218D</b>			SeqNo: <b>1335938</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	4.39	0.50	5	0	87.8	54-138	0			
Aroclor 1260	4.685	0.50	5	0	93.7	57-136	0			
<i>Surr: Decachlorobiphenyl</i>	0.1828	0.050	0.2	0	91.4	54-140	0			
<i>Surr: Tetrachloro-m-xylene</i>	0.1853	0.050	0.2	0	92.7	53-137	0			

<b>LCSD</b>		Sample ID: <b>PLCSDW2-080219</b>			Units: <b>µg/L</b>			Analysis Date: <b>02/19/08 15:55</b>		
Client ID:		Run ID: <b>ECD_7_080218D</b>			SeqNo: <b>1335939</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	4.882	0.50	5	0	97.6	54-138	4.39	10.6	20	
Aroclor 1260	5.407	0.50	5	0	108	57-136	4.685	14.3	20	
<i>Surr: Decachlorobiphenyl</i>	0.212	0.050	0.2	0	106	54-140	0.1828	14.8	20	
<i>Surr: Tetrachloro-m-xylene</i>	0.2085	0.050	0.2	0	104	53-137	0.1853	11.8	20	

The following samples were analyzed in this batch:

0802300-09F 0802300-10F

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28298** Instrument ID **ECD\_5** Method: **SW8151**

<b>MBLK</b>	Sample ID: <b>HBLKW1-080219</b>			Units: <b>µg/L</b>			Analysis Date: <b>02/20/08 18:06</b>			
Client ID:	Run ID: <b>ECD_5_080220A</b>			SeqNo: <b>1335978</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	U	0.10								
2,4,5-TP (Silvex)	U	0.10								
2,4-D	U	0.20								
2,4-DB	U	0.20								
Dalapon	U	0.10								
Dicamba	U	0.10								
Dichlorprop	U	0.20								
Dinoseb	U	0.10								
MCPA	U	20								
MCPP	U	20								
Surr: DCAA	4.542	0.20	5	0	90.8	50-130	0			

<b>LCS</b>	Sample ID: <b>HLC SW1-080219</b>			Units: <b>µg/L</b>			Analysis Date: <b>02/20/08 18:43</b>			
Client ID:	Run ID: <b>ECD_5_080220A</b>			SeqNo: <b>1335979</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	2.463	0.10	2.5	0	98.5	44-122	0			
2,4,5-TP (Silvex)	2.451	0.10	2.5	0	98	49-126	0			
2,4-D	1.608	0.20	2.5	0	64.3	39-120	0			
2,4-DB	2.495	0.20	2.5	0	99.8	44-120	0			
Dalapon	1.072	0.10	2.5	0	42.9	40-120	0			P
Dicamba	2.491	0.10	2.5	0	99.6	60-120	0			
Dichlorprop	2.502	0.20	2.5	0	100	68-122	0			
Dinoseb	2.214	0.10	2.5	0	88.6	28-115	0			
MCPA	165.6	20	250	0	66.2	62-144	0			
MCPP	245.4	20	250	0	98.2	60-133	0			
Surr: DCAA	4.961	0.20	5	0	99.2	50-130	0			

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: **28298** Instrument ID **ECD\_5** Method: **SW8151**

LCSD		Sample ID: <b>HLCSDW1-080219</b>				Units: <b>µg/L</b>		Analysis Date: <b>02/20/08 19:21</b>		
Client ID:		Run ID: <b>ECD_5_080220A</b>				SeqNo: <b>1335980</b>		Prep Date: <b>2/19/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	2.521	0.10	2.5	0	101	44-122	2.463	2.3	30	
2,4,5-TP (Silvex)	2.496	0.10	2.5	0	99.9	49-126	2.451	1.83	30	
2,4-D	1.712	0.20	2.5	0	68.5	39-120	1.608	6.22	30	
2,4-DB	2.561	0.20	2.5	0	102	44-120	2.495	2.58	30	
Dalapon	1.055	0.10	2.5	0	42.2	40-120	1.072	1.61	30	P
Dicamba	2.519	0.10	2.5	0	101	60-120	2.491	1.13	30	
Dichlorprop	2.582	0.20	2.5	0	103	68-122	2.502	3.12	30	
Dinoseb	2.243	0.10	2.5	0	89.7	28-115	2.214	1.27	30	
MCPA	167	20	250	0	66.8	62-144	165.6	0.852	30	
MCPP	253.5	20	250	0	101	60-133	245.4	3.26	30	
<i>Surr: DCAA</i>	<i>4.961</i>	<i>0.20</i>	<i>5</i>	<i>0</i>	<i>99.2</i>	<i>50-130</i>	<i>4.961</i>	<i>0.00322</i>	<i>30</i>	

The following samples were analyzed in this batch:

0802300-09G 0802300-10G

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 6 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28324** Instrument ID **ECD\_1** Method: **SW8081**

MBLK		Sample ID: <b>PBLKS1-080220</b>			Units: <b>µg/Kg</b>			Analysis Date: <b>02/24/08 12:45</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>			SeqNo: <b>1335513</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	U	3.3								
4,4'-DDE	U	3.3								
4,4'-DDT	U	3.3								
Aldrin	U	1.7								
alpha-BHC	U	1.7								
beta-BHC	U	1.7								
Chlordane	U	17								
delta-BHC	U	1.7								
Dieldrin	U	3.3								
Endosulfan I	U	1.7								
Endosulfan II	U	3.3								
Endosulfan sulfate	U	3.3								
Endrin	U	3.3								
Endrin aldehyde	U	3.3								
Endrin ketone	U	3.3								
gamma-BHC	U	1.7								
Heptachlor	U	1.7								
Heptachlor epoxide	U	1.7								
Methoxychlor	U	17								
Toxaphene	U	17								
Surr: Decachlorobiphenyl	6.233	3.3	6.667	0	93.5	59-144	0			
Surr: Tetrachloro-m-xylene	5.783	1.6	6.667	0	86.7	56.9-130	0			

MBLK		Sample ID: <b>PBLKS1-080220</b>			Units: <b>µg/Kg</b>			Analysis Date: <b>02/24/08 12:45</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>			SeqNo: <b>1335528</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	U	1.7								
gamma-Chlordane	U	1.7								

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: **28324** Instrument ID **ECD\_1** Method: **SW8081**

LCS		Sample ID: <b>PLCSS1-080220</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 13:19</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335514</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	15.86	3.3	16.67	0	95.1	53-138	0			
4,4'-DDE	15.64	3.3	16.67	0	93.8	57-136	0			
4,4'-DDT	16.11	3.3	16.67	0	96.7	53-139	0			
Aldrin	6.995	1.7	8.333	0	83.9	52-130	0			
alpha-BHC	7.352	1.7	8.333	0	88.2	52-130	0			
beta-BHC	7.426	1.7	8.333	0	89.1	62-130	0			
delta-BHC	7.077	1.7	8.333	0	84.9	41-137	0			
Dieldrin	15.4	3.3	16.67	0	92.4	54-138	0			
Endosulfan I	7.705	1.7	8.333	0	92.5	55-132	0			
Endosulfan II	15.06	3.3	16.67	0	90.3	59-134	0			
Endosulfan sulfate	16.07	3.3	16.67	0	96.4	54-141	0			
Endrin	19.29	3.3	16.67	0	116	60-157	0			
Endrin aldehyde	13.7	3.3	16.67	0	82.2	56-146	0			
Endrin ketone	16.81	3.3	16.67	0	101	56-153	0			
gamma-BHC	7.702	1.7	8.333	0	92.4	52-133	0			
Heptachlor	7.62	1.7	8.333	0	91.4	54-134	0			
Heptachlor epoxide	7.397	1.7	8.333	0	88.8	58-130	0			
Methoxychlor	85.99	17	83.33	0	103	60-140	0			
Surr: Decachlorobiphenyl	6.944	3.3	6.667	0	104	60-150	0			
Surr: Tetrachloro-m-xylene	6.044	1.6	6.667	0	90.7	60-135	0			

LCS		Sample ID: <b>PLCSS1-080220</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 13:19</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335529</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	7.175	1.7	8.333	0	86.1	55-132	0			
gamma-Chlordane	7.337	1.7	8.333	0	88	60-129	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28324** Instrument ID **ECD\_1** Method: **SW8081**

MS Sample ID: <b>0802304-01DMS</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/24/08 16:10</b>			
Client ID:		Run ID: <b>ECD_1_080223D</b>			SeqNo: <b>1335519</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	15	3.3	16.64	0	90.1	53-138	0			
4,4'-DDE	14.96	3.3	16.64	0	89.9	57-136	0			
4,4'-DDT	14.92	3.3	16.64	0	89.6	53-139	0			
Aldrin	6.584	1.7	8.319	0	79.1	52-130	0			
alpha-BHC	7.075	1.7	8.319	0	85	52-130	0			
beta-BHC	7.523	1.7	8.319	0	90.4	62-130	0			
delta-BHC	7.593	1.7	8.319	0	91.3	41-137	0			
Dieldrin	14.83	3.3	16.64	0	89.1	54-138	0			
Endosulfan I	7.343	1.7	8.319	0	88.3	55-132	0			
Endosulfan II	14.5	3.3	16.64	0	87.2	59-134	0			
Endosulfan sulfate	16.35	3.3	16.64	0	98.2	54-141	0			
Endrin	18.47	3.3	16.64	0	111	60-157	0			
Endrin aldehyde	15.69	3.3	16.64	0	94.3	56-146	0			
Endrin ketone	16.93	3.3	16.64	0	102	56-153	0			
gamma-BHC	7.268	1.7	8.319	0	87.4	52-133	0			
Heptachlor	7.272	1.7	8.319	0	87.4	54-134	0			
Heptachlor epoxide	6.87	1.7	8.319	0	82.6	58-130	0			
Methoxychlor	85.56	17	83.19	0	103	60-140	0			
Surr: Decachlorobiphenyl	6.142	3.3	6.656	0	92.3	60-150	0			
Surr: Tetrachloro-m-xylene	5.499	1.6	6.656	0	82.6	60-135	0			

MS Sample ID: <b>0802304-01DMS</b>				Units: <b>µg/Kg</b>			Analysis Date: <b>02/24/08 16:10</b>			
Client ID:		Run ID: <b>ECD_1_080223D</b>			SeqNo: <b>1335534</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	6.877	1.7	8.319	0	82.7	55-132	0			
gamma-Chlordane	7.267	1.7	8.319	0	87.3	60-129	0			

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

CLIENT: Malcolm Pirnie, Inc.  
Work Order: 0802300  
Project: Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: **28324** Instrument ID **ECD\_1** Method: **SW8081**

MSD		Sample ID: <b>0802304-01DMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 16:44</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335520</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
4,4'-DDD	14.45	3.3	16.66	0	86.8	53-138	15	3.69	30	
4,4'-DDE	14.54	3.3	16.66	0	87.3	57-136	14.96	2.79	30	
4,4'-DDT	14.49	3.3	16.66	0	87	53-139	14.92	2.9	30	
Aldrin	6.272	1.7	8.331	0	75.3	52-130	6.584	4.85	30	
alpha-BHC	6.759	1.7	8.331	0	81.1	52-130	7.075	4.56	30	
beta-BHC	7.186	1.7	8.331	0	86.3	62-130	7.523	4.59	30	
delta-BHC	7.229	1.7	8.331	0	86.8	41-137	7.593	4.91	30	
Dieldrin	14.31	3.3	16.66	0	85.9	54-138	14.83	3.59	30	
Endosulfan I	7.109	1.7	8.331	0	85.3	55-132	7.343	3.24	30	
Endosulfan II	14	3.3	16.66	0	84	59-134	14.5	3.55	30	
Endosulfan sulfate	15.64	3.3	16.66	0	93.9	54-141	16.35	4.41	30	
Endrin	17.77	3.3	16.66	0	107	60-157	18.47	3.88	30	
Endrin aldehyde	15.22	3.3	16.66	0	91.3	56-146	15.69	3.1	30	
Endrin ketone	16.55	3.3	16.66	0	99.3	56-153	16.93	2.29	30	
gamma-BHC	6.934	1.7	8.331	0	83.2	52-133	7.268	4.7	30	
Heptachlor	6.941	1.7	8.331	0	83.3	54-134	7.272	4.65	30	
Heptachlor epoxide	6.668	1.7	8.331	0	80	58-130	6.87	2.98	30	
Methoxychlor	83.98	17	83.31	0	101	60-140	85.56	1.86	30	
Surr: Decachlorobiphenyl	6.005	3.3	6.664	0	90.1	60-150	6.142	2.25	30	
Surr: Tetrachloro-m-xylene	5.218	1.6	6.664	0	78.3	60-135	5.499	5.25	30	

MSD		Sample ID: <b>0802304-01DMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 16:44</b>		
Client ID:		Run ID: <b>ECD_1_080223D</b>				SeqNo: <b>1335535</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
alpha-Chlordane	6.624	1.7	8.331	0	79.5	55-132	6.877	3.75	30	
gamma-Chlordane	7.218	1.7	8.331	0	86.6	60-129	7.267	0.676	30	

The following samples were analyzed in this batch:

0802300-02D	0802300-05D	0802300-08C
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ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 10 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28325** Instrument ID **ECD\_7** Method: **SW8082**

MBLK		Sample ID: <b>PBLKS2-080220</b>		Units: <b>µg/Kg</b>		Analysis Date: <b>02/25/08 23:35</b>				
Client ID:		Run ID: <b>ECD_7_080225A</b>		SeqNo: <b>1335803</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	U	17								
Aroclor 1221	U	17								
Aroclor 1232	U	17								
Aroclor 1242	U	17								
Aroclor 1248	U	17								
Aroclor 1254	U	17								
Aroclor 1260	U	17								
<i>Surr: Decachlorobiphenyl</i>	6.346	1.6	6.667	0	95.2	54-143	0			
<i>Surr: Tetrachloro-m-xylene</i>	6.115	1.6	6.667	0	91.7	55-137	0			

LCS		Sample ID: <b>PLCSS2-080220</b>		Units: <b>µg/Kg</b>		Analysis Date: <b>02/26/08 0:09</b>				
Client ID:		Run ID: <b>ECD_7_080225A</b>		SeqNo: <b>1335804</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	149.8	17	166.7	0	89.9	53-135	0			
Aroclor 1260	158.4	17	166.7	0	95	54-137	0			
<i>Surr: Decachlorobiphenyl</i>	7.065	1.6	6.667	0	106	54-143	0			
<i>Surr: Tetrachloro-m-xylene</i>	6.785	1.6	6.667	0	102	55-137	0			

MS		Sample ID: <b>0802304-02CMS</b>		Units: <b>µg/Kg</b>		Analysis Date: <b>02/26/08 6:24</b>				
Client ID:		Run ID: <b>ECD_7_080225A</b>		SeqNo: <b>1335815</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	151.3	17	166.4	0	91	53-135	0			
Aroclor 1260	162.9	17	166.4	0	97.9	54-137	0			
<i>Surr: Decachlorobiphenyl</i>	6.282	1.6	6.656	0	94.4	54-143	0			
<i>Surr: Tetrachloro-m-xylene</i>	6.143	1.6	6.656	0	92.3	55-137	0			

MSD		Sample ID: <b>0802304-02CMSD</b>		Units: <b>µg/Kg</b>		Analysis Date: <b>02/26/08 6:58</b>				
Client ID:		Run ID: <b>ECD_7_080225A</b>		SeqNo: <b>1335816</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aroclor 1016	154.1	17	166.6	0	92.5	53-135	151.3	1.84	30	
Aroclor 1260	165.8	17	166.6	0	99.5	54-137	162.9	1.75	30	
<i>Surr: Decachlorobiphenyl</i>	6.443	1.6	6.664	0	96.7	54-143	6.282	2.54	30	
<i>Surr: Tetrachloro-m-xylene</i>	6.248	1.6	6.664	0	93.8	55-137	6.143	1.7	30	

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

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Batch ID: **28325**      Instrument ID **ECD\_7**      Method: **SW8082**

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The following samples were analyzed in this batch:

0802300-01C	0802300-02C	0802300-03C
0802300-04C	0802300-05C	0802300-06C
0802300-07C	0802300-08D	

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ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 12 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: **28371** Instrument ID **ECD\_5** Method: **SW8151**

<b>MBLK</b>	Sample ID: <b>HBLKS1-080222</b>		Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 12:20</b>					
Client ID:	Run ID: <b>ECD_5_080221C</b>		SeqNo: <b>1335482</b>		Prep Date: <b>2/22/2008</b>		DF: <b>1</b>			
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	U	3.3								
2,4,5-TP (Silvex)	U	3.3								
2,4-D	U	6.6								
2,4-DB	U	6.6								
Dalapon	U	3.3								
Dicamba	U	3.3								
Dichlorprop	U	6.6								
Dinoseb	U	3.3								
MCPA	U	660								
MCPD	U	660								
Surr: DCAA	187.5	6.6	166.7	0	113	30-150	0			

<b>LCS</b>	Sample ID: <b>HLCSS1-080222</b>		Units: <b>µg/Kg</b>		Analysis Date: <b>02/24/08 12:57</b>					
Client ID:	Run ID: <b>ECD_5_080221C</b>		SeqNo: <b>1335483</b>		Prep Date: <b>2/22/2008</b>		DF: <b>1</b>			
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	82.53	3.3	83.33	0	99	50-150	0			
2,4,5-TP (Silvex)	93.76	3.3	83.33	0	113	50-150	0			
2,4-D	68.06	6.6	83.33	0	81.7	40-150	0			
2,4-DB	86.73	6.6	83.33	0	104	40-150	0			
Dalapon	88.32	3.3	83.33	0	106	30-150	0			
Dicamba	77.37	3.3	83.33	0	92.8	40-150	0			
Dichlorprop	83.16	6.6	83.33	0	99.8	40-150	0			
Dinoseb	77.29	3.3	83.33	0	92.7	40-150	0			
MCPA	7051	660	8333	0	84.6	40-150	0			
MCPD	7660	660	8333	0	91.9	40-150	0			
Surr: DCAA	176.7	6.6	166.7	0	106	50-150	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28371** Instrument ID **ECD\_5** Method: **SW8151**

MS				Sample ID: 0802304-01DMS			Units: µg/Kg		Analysis Date: 02/24/08 15:26	
Client ID:		Run ID: ECD_5_080221C			SeqNo: 1335504		Prep Date: 2/22/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	67.56	3.3	83.22	0	81.2	50-150	0			
2,4,5-TP (Silvex)	66.67	3.3	83.22	0	80.1	50-150	0			
2,4-D	53.91	6.6	83.22	0	64.8	40-150	0			
2,4-DB	77.8	6.6	83.22	0	93.5	40-150	0			
Dalapon	63.74	3.3	83.22	0	76.6	30-150	0			
Dicamba	55.25	3.3	83.22	0	66.4	40-150	0			
Dichlorprop	63.97	6.6	83.22	0	76.9	40-150	0			
Dinoseb	72	3.3	83.22	0	86.5	40-150	0			
MCPA	5862	660	8322	0	70.4	40-150	0			
MCP	4491	660	8322	0	54	40-150	0			P
Surr: DCAA	92.07	6.6	166.4	0	55.3	50-150	0			

MSD				Sample ID: 0802304-01DMSD			Units: µg/Kg		Analysis Date: 02/24/08 16:03	
Client ID:		Run ID: ECD_5_080221C			SeqNo: 1335505		Prep Date: 2/22/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
2,4,5-T	67.98	3.3	83.31	0	81.6	50-150	67.56	0.626	30	
2,4,5-TP (Silvex)	65.83	3.3	83.31	0	79	50-150	66.67	1.26	30	
2,4-D	54.52	6.6	83.31	0	65.4	40-150	53.91	1.12	30	
2,4-DB	78.07	6.6	83.31	0	93.7	40-150	77.8	0.346	30	
Dalapon	62.65	3.3	83.31	0	75.2	30-150	63.74	1.73	30	
Dicamba	55.69	3.3	83.31	0	66.8	40-150	55.25	0.787	30	
Dichlorprop	63.76	6.6	83.31	0	76.5	40-150	63.97	0.332	30	
Dinoseb	72.28	3.3	83.31	0	86.8	40-150	72	0.387	30	
MCPA	6291	660	8331	0	75.5	40-150	5862	7.06	30	
MCP	4425	660	8331	0	53.1	40-150	4491	1.47	30	P
Surr: DCAA	89.52	6.6	166.6	0	53.7	50-150	92.07	2.8	30	

The following samples were analyzed in this batch:

0802300-02D	0802300-05D	0802300-08C
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ND - Not Detected at the Reporting Limit  
J - Analyte detected below quantitation limits  
O - Referenced analyte value is > 4 times amount spiked  
S - Spike Recovery outside accepted recovery limits  
R - RPD outside accepted recovery limits  
P - Dual Column results percent difference > 40%  
B - Analyte detected in assoc. Method Blank  
U - Analyzed for but not detected  
E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28300**      Instrument ID **FID-8**      Method: **SW8015M**

MBLK		Sample ID: FBLKW1-080219				Units: mg/L		Analysis Date: 02/22/08 16:39			
Client ID:		Run ID: FID-8_080219B				SeqNo: 1336385		Prep Date: 2/19/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual	
TPH (Diesel Range)	U	0.050									
Surr: 2-Fluorobiphenyl	0.07635	0.0050	0.1	0	76.4	70-130	0				

LCS	Sample ID: <b>FLCSW1-080219</b>					Units: <b>mg/L</b>		Analysis Date: <b>02/22/08 17:20</b>		
Client ID:		Run ID: <b>FID-8_080219B</b>			SeqNo: <b>1336386</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	0.9306	0.050	1	0	93.1	70-130	0			
<i>Surr: 2-Fluorobiphenyl</i>	<i>0.07913</i>	0.0050	<i>0.1</i>	0	<i>79.1</i>	<i>70-130</i>	0			

LCSD	Sample ID: FLCSDW1-080219				Units: mg/L			Analysis Date: 02/22/08 18:02		
Client ID:	Run ID: FID-8_080219B				SeqNo: 1336387		Prep Date: 2/19/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	1.081	0.050	1	0	108	70-130	0.9306	15	20	
Surr: 2-Fluorobiphenyl	0.0815	0.0050	0.1	0	81.5	70-130	0.07913	2.95	20	

The following samples were analyzed in this batch:

0802300-09D	0802300-10D
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ND - Not Detected at the Reporting Limit	S - Spike Recovery outside accepted recovery limits	B - Analyte detected in assoc. Method Blank
J - Analyte detected below quantitation limits	R - RPD outside accepted recovery limits	U - Analyzed for but not detected
O - Referenced analyte value is > 4 times amount spiked	P - Dual Column results percent difference > 40%	E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28331** Instrument ID **FID-2** Method: **SW8015M**

<b>MBLK</b>	Sample ID: <b>FBLKS1-080221</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 0:05</b>		
Client ID:	Run ID: <b>FID-2_080221A</b>				SeqNo: <b>1336416</b>		Prep Date: <b>2/21/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	U	1.7								
<i>Surr: 2-Fluorobiphenyl</i>	3.292	0.10	3.333	0	98.8	70-130	0			

<b>LCS</b>	Sample ID: <b>FLCSS1-080221</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 0:55</b>		
Client ID:	Run ID: <b>FID-2_080221A</b>				SeqNo: <b>1336417</b>		Prep Date: <b>2/21/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	39.46	1.7	33.33	0	118	70-130	0			
<i>Surr: 2-Fluorobiphenyl</i>	3.922	0.10	3.333	0	118	70-130	0			

<b>MS</b>	Sample ID: <b>0802304-01CMS</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 6:46</b>		
Client ID:	Run ID: <b>FID-2_080221A</b>				SeqNo: <b>1336424</b>		Prep Date: <b>2/21/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	36.64	1.7	33.32	0.3677	109	70-130	0			
<i>Surr: 2-Fluorobiphenyl</i>	3.646	0.10	3.332	0	109	70-130	0			

<b>MSD</b>	Sample ID: <b>0802304-01CMSD</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 7:36</b>		
Client ID:	Run ID: <b>FID-2_080221A</b>				SeqNo: <b>1336425</b>		Prep Date: <b>2/21/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
TPH (Diesel Range)	36.1	1.7	33.3	0.3677	107	70-130	36.64	1.51	30	
<i>Surr: 2-Fluorobiphenyl</i>	3.461	0.10	3.33	0	104	70-130	3.646	5.18	30	

The following samples were analyzed in this batch:

0802300-01C	0802300-02C	0802300-04C
0802300-05C	0802300-07C	0802300-08C

ND - Not Detected at the Reporting Limit  
J - Analyte detected below quantitation limits  
O - Referenced analyte value is > 4 times amount spiked  
S - Spike Recovery outside accepted recovery limits  
R - RPD outside accepted recovery limits  
P - Dual Column results percent difference > 40%  
B - Analyte detected in assoc. Method Blank  
U - Analyzed for but not detected  
E - Value above quantitation range



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: **28303** Instrument ID **ICPMS02** Method: **SW6020**

MBLK		Sample ID: <b>MBLKS3-021908</b>			Units: <b>mg/Kg</b>			Analysis Date: <b>02/19/08 17:34</b>		
Client ID:		Run ID: <b>ICPMS02_080219A</b>			SeqNo: <b>1330873</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	U	0.50								
Arsenic	U	0.50								
Barium	U	0.50								
Beryllium	0.04139	0.50								J
Boron	0.6935	2.5								J
Cadmium	0.04304	0.50								J
Calcium	U	50								
Chromium	0.09404	0.50								J
Cobalt	U	0.50								
Copper	U	0.50								
Iron	U	50								
Lead	U	0.50								
Magnesium	3.905	50								J
Manganese	U	0.50								
Molybdenum	U	0.50								
Nickel	U	0.50								
Potassium	6.417	50								J
Selenium	U	0.50								
Silver	U	0.50								
Sodium	U	50								
Strontium	U	0.50								
Thallium	U	0.50								
Tin	1.189	2.5								J
Titanium	U	0.50								
Vanadium	U	0.50								
Zinc	U	0.50								

MBLK		Sample ID: <b>MBLKS3-021908</b>			Units: <b>mg/Kg</b>			Analysis Date: <b>02/20/08 15:24</b>		
Client ID:		Run ID: <b>ICPMS02_080220A</b>			SeqNo: <b>1331204</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	U	1.0								

ND - Not Detected at the Reporting Limit  
J - Analyte detected below quantitation limits  
O - Referenced analyte value is > 4 times amount spiked  
S - Spike Recovery outside accepted recovery limits  
R - RPD outside accepted recovery limits  
P - Dual Column results percent difference > 40%  
B - Analyte detected in assoc. Method Blank  
U - Analyzed for but not detected  
E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: **28303** Instrument ID **ICPMS02** Method: **SW6020**

**LCS** Sample ID: **MLCSS3-021908** Units: **mg/Kg** Analysis Date: **02/19/08 17:40**

Client ID: Run ID: **ICPMS02\_080219A** SeqNo: **1330874** Prep Date: **2/19/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	9.379	0.50	10	0	93.8	80-120	0			
Arsenic	9.465	0.50	10	0	94.6	80-120	0			
Barium	9.6	0.50	10	0	96	80-120	0			
Beryllium	9.578	0.50	10	0	95.8	80-120	0			
Boron	52.73	2.5	50	0	105	80-120	0			
Cadmium	9.691	0.50	10	0	96.9	80-120	0			
Calcium	994.2	50	1000	0	99.4	80-120	0			
Chromium	9.922	0.50	10	0	99.2	80-120	0			
Cobalt	10.45	0.50	10	0	104	80-120	0			
Copper	9.8	0.50	10	0	98	80-120	0			
Iron	980	50	1000	0	98	80-120	0			
Lead	9.937	0.50	10	0	99.4	80-120	0			
Magnesium	983.9	50	1000	0	98.4	80-120	0			
Manganese	9.567	0.50	10	0	95.7	80-120	0			
Molybdenum	9.727	0.50	10	0	97.3	80-120	0			
Nickel	10.02	0.50	10	0	100	80-120	0			
Potassium	989.6	50	1000	0	99	80-120	0			
Selenium	9.045	0.50	10	0	90.4	80-120	0			
Silver	9.902	0.50	10	0	99	80-120	0			
Sodium	983.8	50	1000	0	98.4	80-120	0			
Strontium	9.854	0.50	10	0	98.5	80-120	0			
Thallium	9.522	0.50	10	0	95.2	80-120	0			
Tin	11.27	2.5	10	0	113	80-120	0			
Titanium	19.59	0.50	20	0	98	80-120	0			
Vanadium	10.02	0.50	10	0	100	80-120	0			
Zinc	9.298	0.50	10	0	93	80-120	0			

**LCS** Sample ID: **MLCSS3-021908** Units: **mg/Kg** Analysis Date: **02/20/08 15:30**

Client ID: Run ID: **ICPMS02\_080220A** SeqNo: **1331205** Prep Date: **2/19/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	10.69	1.0	10	0	107	80-120	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: **28303** Instrument ID **ICPMS02** Method: **SW6020**

MS		Sample ID: <b>0802300-02DMS</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/19/08 18:11</b>		
Client ID: <b>F14-SB-1 (13-15)</b>		Run ID: <b>ICPMS02_080219A</b>				SeqNo: <b>1330879</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	3211	0.94	9.346	2634	6180	75-125	0			SEO
Antimony	5.328	0.47	9.346	0.07536	56.2	75-125	0			S
Arsenic	10.35	0.47	9.346	1.775	91.7	75-125	0			
Barium	24.65	0.47	9.346	16.94	82.5	75-125	0			
Beryllium	8.177	0.47	9.346	0.2088	85.3	75-125	0			
Boron	48.12	2.3	46.73	4.732	92.9	75-125	0			
Cadmium	8.737	0.47	9.346	0.07227	92.7	75-125	0			
Calcium	15640	47	934.6	14820	88	75-125	0			O
Chromium	12.22	0.47	9.346	2.909	99.7	75-125	0			
Cobalt	10.62	0.47	9.346	1.036	103	75-125	0			
Copper	9.449	0.47	9.346	0.9607	90.8	75-125	0			
Iron	3978	47	934.6	2836	122	75-125	0			
Lead	11.5	0.47	9.346	2.508	96.3	75-125	0			
Magnesium	2951	47	934.6	1822	121	75-125	0			
Manganese	49.27	0.47	9.346	43.75	59.1	75-125	0			SO
Molybdenum	8.644	0.47	9.346	0.1732	90.6	75-125	0			
Nickel	10.77	0.47	9.346	2.066	93.1	75-125	0			
Potassium	1704	47	934.6	743.6	103	75-125	0			
Selenium	8.624	0.47	9.346	0.2471	89.6	75-125	0			
Silver	8.59	0.47	9.346	0.02815	91.6	75-125	0			
Sodium	1306	47	934.6	403.2	96.6	75-125	0			
Strontium	65.52	0.47	9.346	56.93	91.9	75-125	0			O
Thallium	8.405	0.47	9.346	0.05913	89.3	75-125	0			
Tin	9.841	2.3	9.346	1.067	93.9	75-125	0			
Titanium	87.48	0.47	18.69	66.52	112	75-125	0			
Vanadium	20.93	0.47	9.346	10.9	107	75-125	0			
Zinc	15.37	0.47	9.346	5.963	101	75-125	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 19 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28303** Instrument ID **ICPMS02** Method: **SW6020**

MSD		Sample ID: 0802300-02DMSD				Units: mg/Kg		Analysis Date: 02/19/08 18:17		
Client ID: F14-SB-1 (13-15)		Run ID: ICPMS02_080219A				SeqNo: 1330880		Prep Date: 2/19/2008		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	3192	0.94	9.346	2634	5970	75-125	3211	0.613	25	SEO
Antimony	5.009	0.47	9.346	0.07536	52.8	75-125	5.328	6.17	25	S
Arsenic	9.981	0.47	9.346	1.775	87.8	75-125	10.35	3.59	25	
Barium	26.54	0.47	9.346	16.94	103	75-125	24.65	7.37	25	
Beryllium	8.064	0.47	9.346	0.2088	84.1	75-125	8.177	1.38	25	
Boron	47.96	2.3	46.73	4.732	92.5	75-125	48.12	0.331	25	
Cadmium	8.594	0.47	9.346	0.07227	91.2	75-125	8.737	1.65	25	
Calcium	16450	47	934.6	14820	174	75-125	15640	5.01	25	SO
Chromium	11.73	0.47	9.346	2.909	94.4	75-125	12.22	4.14	25	
Cobalt	9.925	0.47	9.346	1.036	95.1	75-125	10.62	6.73	25	
Copper	9.096	0.47	9.346	0.9607	87	75-125	9.449	3.8	25	
Iron	3873	47	934.6	2836	111	75-125	3978	2.67	25	
Lead	11.22	0.47	9.346	2.508	93.3	75-125	11.5	2.47	25	
Magnesium	2849	47	934.6	1822	110	75-125	2951	3.54	25	
Manganese	46.69	0.47	9.346	43.75	31.5	75-125	49.27	5.38	25	SO
Molybdenum	8.461	0.47	9.346	0.1732	88.7	75-125	8.644	2.14	25	
Nickel	10.41	0.47	9.346	2.066	89.3	75-125	10.77	3.35	25	
Potassium	1679	47	934.6	743.6	100	75-125	1704	1.49	25	
Selenium	8.471	0.47	9.346	0.2471	88	75-125	8.624	1.79	25	
Silver	8.419	0.47	9.346	0.02815	89.8	75-125	8.59	2.01	25	
Sodium	1271	47	934.6	403.2	92.9	75-125	1306	2.68	25	
Strontium	73.73	0.47	9.346	56.93	180	75-125	65.52	11.8	25	SO
Thallium	8.323	0.47	9.346	0.05913	88.4	75-125	8.405	0.972	25	
Tin	9.542	2.3	9.346	1.067	90.7	75-125	9.841	3.09	25	
Titanium	89.29	0.47	18.69	66.52	122	75-125	87.48	2.05	25	
Vanadium	19.81	0.47	9.346	10.9	95.4	75-125	20.93	5.46	25	
Zinc	14.73	0.47	9.346	5.963	93.8	75-125	15.37	4.28	25	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28303** Instrument ID **ICPMS02** Method: **SW6020**

DUP		Sample ID: <b>0802300-02DDUP</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/19/08 18:05</b>		
Client ID: <b>F14-SB-1 (13-15)</b>		Run ID: <b>ICPMS02_080219A</b>				SeqNo: <b>1330878</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Antimony	U	0.47	0	0	0	0-0	0.07536	0	25	
Arsenic	1.755	0.47	0	0	0	0-0	1.775	1.11	25	
Barium	16.56	0.47	0	0	0	0-0	16.94	2.29	25	
Beryllium	0.1956	0.47	0	0	0	0-0	0.2088	0	25	J
Boron	4.826	2.3	0	0	0	0-0	4.732	1.98	25	
Cadmium	0.06586	0.47	0	0	0	0-0	0.07227	0	25	J
Calcium	15520	47	0	0	0	0-0	14820	4.62	25	
Chromium	3.025	0.47	0	0	0	0-0	2.909	3.91	25	
Cobalt	0.9324	0.47	0	0	0	0-0	1.036	10.6	25	
Copper	0.9776	0.47	0	0	0	0-0	0.9607	1.74	25	
Iron	2827	47	0	0	0	0-0	2836	0.297	25	
Lead	2.457	0.47	0	0	0	0-0	2.508	2.07	25	
Magnesium	1868	47	0	0	0	0-0	1822	2.48	25	
Manganese	35.51	0.47	0	0	0	0-0	43.75	20.8	25	
Molybdenum	0.1659	0.47	0	0	0	0-0	0.1732	0	25	J
Nickel	2.041	0.47	0	0	0	0-0	2.066	1.23	25	
Potassium	768	47	0	0	0	0-0	743.6	3.23	25	
Selenium	0.2668	0.47	0	0	0	0-0	0.2471	0	25	J
Silver	0.01993	0.47	0	0	0	0-0	0.02815	0	25	J
Sodium	412.1	47	0	0	0	0-0	403.2	2.2	25	
Strontium	57.79	0.47	0	0	0	0-0	56.93	1.48	25	
Thallium	0.05188	0.47	0	0	0	0-0	0.05913	0	25	J
Tin	1.079	2.3	0	0	0	0-0	1.067	0	25	J
Titanium	67.54	0.47	0	0	0	0-0	66.52	1.52	25	
Vanadium	10.79	0.47	0	0	0	0-0	10.9	0.948	25	
Zinc	5.957	0.47	0	0	0	0-0	5.963	0.0941	25	

DUP		Sample ID: <b>0802300-02DDUP</b>				Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 15:49</b>		
Client ID: <b>F14-SB-1 (13-15)</b>		Run ID: <b>ICPMS02_080220A</b>				SeqNo: <b>1331208</b>		Prep Date: <b>2/19/2008</b>		DF: <b>200</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Aluminum	3387	190	0	0	0	0-0	2981	12.7	25	

The following samples were analyzed in this batch:

0802300-01C	0802300-02D	0802300-03C
0802300-04C	0802300-05D	0802300-06C
0802300-07D	0802300-08D	

ND - Not Detected at the Reporting Limit  
J - Analyte detected below quantitation limits  
O - Referenced analyte value is > 4 times amount spiked  
S - Spike Recovery outside accepted recovery limits  
R - RPD outside accepted recovery limits  
P - Dual Column results percent difference > 40%  
B - Analyte detected in assoc. Method Blank  
U - Analyzed for but not detected  
E - Value above quantitation range

CLIENT: Malcolm Pirnie, Inc.  
Work Order: 0802300  
Project: Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: **28308** Instrument ID **Mercury** Method: **SW7470**

<b>MBLK</b>	Sample ID: <b>GBLKW1-022008</b>				Units: <b>mg/L</b>			Analysis Date: <b>02/20/08 13:55</b>		
Client ID:	Run ID: <b>MERCURY_080220B</b>				SeqNo: <b>1331215</b>	Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	U	0.00020								

<b>LCS</b>	Sample ID: <b>GLCSW1-022008</b>				Units: <b>mg/L</b>			Analysis Date: <b>02/20/08 13:57</b>		
Client ID:	Run ID: <b>MERCURY_080220B</b>				SeqNo: <b>1331216</b>	Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	0.00535	0.00020	0.005	0	107	85-115	0			

<b>LCSD</b>	Sample ID: <b>GLCSDW1-022008</b>				Units: <b>mg/L</b>			Analysis Date: <b>02/20/08 13:59</b>		
Client ID:	Run ID: <b>MERCURY_080220B</b>				SeqNo: <b>1331217</b>	Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	0.0054	0.00020	0.005	0	108	85-115	0.00535	0.93	20	

<b>MS</b>	Sample ID: <b>0802349-01DMS</b>				Units: <b>mg/L</b>			Analysis Date: <b>02/20/08 14:05</b>		
Client ID:	Run ID: <b>MERCURY_080220B</b>				SeqNo: <b>1331220</b>	Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	0.00542	0.00020	0.005	-0.000009	109	85-115	0			

<b>MSD</b>	Sample ID: <b>0802349-01DMSD</b>				Units: <b>mg/L</b>			Analysis Date: <b>02/20/08 14:07</b>		
Client ID:	Run ID: <b>MERCURY_080220B</b>				SeqNo: <b>1331221</b>	Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	0.00536	0.00020	0.005	-0.000009	107	85-115	0.00542	1.11	20	

<b>DUP</b>	Sample ID: <b>0802349-01DDUP</b>				Units: <b>mg/L</b>			Analysis Date: <b>02/20/08 14:03</b>		
Client ID:	Run ID: <b>MERCURY_080220B</b>				SeqNo: <b>1331219</b>	Prep Date: <b>2/20/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	U	0.00020	0	0	0	0-0	-0.000009	0	20	

The following samples were analyzed in this batch:

0802300-09B 0802300-10B

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28318** Instrument ID **ICPMS02** Method: **SW6020**

MBLK		Sample ID: MBLKW1-022008				Units: mg/L		Analysis Date: 02/20/08 17:11			
Client ID:		Run ID: ICPMS02_080220A				SeqNo: 1331348		Prep Date: 2/20/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual	
Arsenic	U	0.0050									
Barium	U	0.0050									
Cadmium	U	0.0020									
Chromium	U	0.0050									
Lead	U	0.0050									
Selenium	0.002029	0.0050								J	
Silver	U	0.0050									

LCS	Sample ID: <b>MLCSW1-022008</b>					Units: <b>mg/L</b>		Analysis Date: <b>02/20/08 17:18</b>		
Client ID:	Run ID: <b>ICPMS02_080220A</b>				SeqNo: <b>1331349</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Arsenic	0.04726	0.0050	0.05	0	94.5	80-120	0			
Barium	0.04816	0.0050	0.05	0	96.3	80-120	0			
Cadmium	0.0484	0.0020	0.05	0	96.8	80-120	0			
Chromium	0.04592	0.0050	0.05	0	91.8	80-120	0			
Lead	0.04822	0.0050	0.05	0	96.4	80-120	0			
Selenium	0.04933	0.0050	0.05	0	98.7	80-120	0			
Silver	0.04971	0.0050	0.05	0	99.4	80-120	0			

MS	Sample ID: 0802300-10BMS					Units: mg/L		Analysis Date: 02/20/08 17:49		
Client ID: Rinsate-2			Run ID: ICPMS02_080220A			SeqNo: 1331354		Prep Date: 2/20/2008		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Arsenic	0.04762	0.0050	0.05	-0.0001468	95.5	80-120	0			
Barium	0.0492	0.0050	0.05	-0.0001461	98.7	80-120	0			
Cadmium	0.04955	0.0020	0.05	-0.0003917	99.9	80-120	0			
Chromium	0.04642	0.0050	0.05	-0.0001201	93.1	80-120	0			
Lead	0.04929	0.0050	0.05	-0.000277	99.1	80-120	0			
Selenium	0.04963	0.0050	0.05	0.001053	97.2	80-120	0			
Silver	0.04946	0.0050	0.05	-0.0003218	99.6	80-120	0			

ND - Not Detected at the Reporting Limit  
J - Analyte detected below quantitation limits  
O - Referenced analyte value is > 4 times amount spiked  
S - Spike Recovery outside accepted recovery limits  
R - RPD outside accepted recovery limits  
P - Dual Column results percent difference > 40%  
B - Analyte detected in assoc. Method Blank  
U - Analyzed for but not detected  
E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: **28318** Instrument ID **ICPMS02** Method: **SW6020**

<b>MSD</b>		Sample ID: <b>0802300-10BMSD</b>				Units: <b>mg/L</b>		Analysis Date: <b>02/20/08 17:55</b>		
Client ID: <b>Rinsate-2</b>		Run ID: <b>ICPMS02_080220A</b>				SeqNo: <b>1331355</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Arsenic	0.0491	0.0050	0.05	-0.0001468	98.5	80-120	0.04762	3.06	15	
Barium	0.04936	0.0050	0.05	-0.0001461	99	80-120	0.0492	0.325	15	
Cadmium	0.05057	0.0020	0.05	-0.0003917	102	80-120	0.04955	2.04	15	
Chromium	0.0475	0.0050	0.05	-0.0001201	95.2	80-120	0.04642	2.3	15	
Lead	0.04969	0.0050	0.05	-0.000277	99.9	80-120	0.04929	0.808	15	
Selenium	0.05087	0.0050	0.05	0.001053	99.6	80-120	0.04963	2.47	15	
Silver	0.05197	0.0050	0.05	-0.0003218	105	80-120	0.04946	4.95	15	

<b>DUP</b>		Sample ID: <b>0802300-10BDUP</b>				Units: <b>mg/L</b>		Analysis Date: <b>02/20/08 17:37</b>		
Client ID: <b>Rinsate-2</b>		Run ID: <b>ICPMS02_080220A</b>				SeqNo: <b>1331352</b>		Prep Date: <b>2/20/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Arsenic	U	0.0050	0	0	0	0-0	-0.0001468	0	25	
Barium	U	0.0050	0	0	0	0-0	-0.0001461	0	25	
Cadmium	U	0.0020	0	0	0	0-0	-0.0003917	0	25	
Chromium	U	0.0050	0	0	0	0-0	-0.0001201	0	25	
Lead	U	0.0050	0	0	0	0-0	-0.000277	0	25	
Selenium	0.001784	0.0050	0	0	0	0-0	0.001053	0	25	J
Silver	U	0.0050	0	0	0	0-0	-0.0003218	0	25	

The following samples were analyzed in this batch:

0802300-09B 0802300-10B

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: **28367** Instrument ID **ICP7500** Method: **SW6020**

**MBLK** Sample ID: **MBLKS1-022208** Units: **mg/Kg** Analysis Date: **02/27/08 12:50**

Client ID: Run ID: **ICP7500\_080227A** SeqNo: **1335572** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	U	5.0								

**LCS** Sample ID: **MLCSS1-022208** Units: **mg/Kg** Analysis Date: **02/27/08 12:53**

Client ID: Run ID: **ICP7500\_080227A** SeqNo: **1335573** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	47.04	5.0	50	0	94.1	80-120	0			

**MS** Sample ID: **0802300-05EMS** Units: **mg/Kg** Analysis Date: **02/27/08 13:28**

Client ID: **F14-SB-4 (13-15)** Run ID: **ICP7500\_080227A** SeqNo: **1335584** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	45.29	4.7	47.17	4.044	87.4	80-120	0			

**MSD** Sample ID: **0802300-05EMSD** Units: **mg/Kg** Analysis Date: **02/27/08 13:32**

Client ID: **F14-SB-4 (13-15)** Run ID: **ICP7500\_080227A** SeqNo: **1335585** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	46.21	4.7	47.17	4.044	89.4	80-120	45.29	2	25	

**DUP** Sample ID: **0802300-05EDUP** Units: **mg/Kg** Analysis Date: **02/27/08 13:25**

Client ID: **F14-SB-4 (13-15)** Run ID: **ICP7500\_080227A** SeqNo: **1335583** Prep Date: **2/22/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Lithium	U	4.7	0	0	0		4.044	0		

The following samples were analyzed in this batch:

0802300-01D	0802300-02E	0802300-03D
0802300-04D	0802300-05E	0802300-06D
0802300-07E	0802300-08E	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

CLIENT: Malcolm Pirnie, Inc.  
Work Order: 0802300  
Project: Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: **28372** Instrument ID **Mercury** Method: **SW7471A**

<b>MBLK</b>	Sample ID: <b>GBLKS1-022508</b>					Units: <b>µg/Kg</b>		Analysis Date: <b>02/25/08 14:58</b>		
Client ID:	Run ID: <b>MERCURY_080225A</b>				SeqNo: <b>1334001</b>		Prep Date: <b>2/25/2008</b>		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	U	13								

LCS	Sample ID: GLCSS1-022508					Units: µg/Kg		Analysis Date: 02/25/08 15:00		
Client ID:	Run ID: MERCURY_080225A				SeqNo: 1334002		Prep Date: 2/25/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	347.3	13	333.3	0	104	85-115	0			

LCSD	Sample ID: GLCSDS1-022508					Units: µg/Kg		Analysis Date: 02/25/08 15:02		
Client ID:	Run ID: MERCURY_080225A				SeqNo: 1334003		Prep Date: 2/25/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	344.7	13	333.3	0	103	85-115	347.3	0.771	20	

MS	Sample ID: 0802300-01CMS					Units: µg/Kg		Analysis Date: 02/25/08 15:16		
Client ID: F14-SB-1 (0-2)			Run ID: MERCURY_080225A		SeqNo: 1334006		Prep Date: 2/25/2008		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	329.9	13	330.6	9.451	96.9	85-115	0			

MSD	Sample ID: 0802300-01CMSD					Units: µg/Kg		Analysis Date: 02/25/08 15:18		
Client ID: F14-SB-1 (0-2)			Run ID: MERCURY_080225A			SeqNo: 1334007		Prep Date: 2/25/2008		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	335.1	13	331.1	9.451	98.3	85-115	329.9	1.56	20	

DUP	Sample ID: 0802300-01CDUP					Units: µg/Kg		Analysis Date: 02/25/08 15:14		
Client ID: F14-SB-1 (0-2)			Run ID: MERCURY_080225A			SeqNo: 1334005		Prep Date: 2/25/2008		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Mercury	9.455	13	0	0	0		9.451	0	20	J

The following samples were analyzed in this batch:

0802300-01C	0802300-02D	0802300-03C
0802300-04C	0802300-05D	0802300-06C
0802300-07D	0802300-08D	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 26 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28295** Instrument ID **SV-4** Method: **SW8270**

MBLK		Sample ID: <b>SBLKS1-080219</b>		Units: <b>µg/Kg</b>		Analysis Date: <b>02/20/08 16:31</b>				
Client ID:		Run ID: <b>SV-4_080220A</b>		SeqNo: <b>1332654</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	U	6.6								
2,4,5-Trichlorophenol	U	6.6								
2,4,6-Trichlorophenol	U	6.6								
2,4-Dichlorophenol	U	6.6								
2,4-Dimethylphenol	U	6.6								
2,4-Dinitrophenol	U	33								
2,4-Dinitrotoluene	U	6.6								
2,6-Dinitrotoluene	U	6.6								
2-Chloronaphthalene	U	6.6								
2-Chlorophenol	U	6.6								
2-Methylnaphthalene	U	6.6								
2-Methylphenol	U	6.6								
2-Nitroaniline	U	6.6								
2-Nitrophenol	U	6.6								
3&4-Methylphenol	U	6.6								
3,3'-Dichlorobenzidine	U	6.6								
3-Nitroaniline	U	6.6								
4,6-Dinitro-2-methylphenol	U	6.6								
4-Bromophenyl phenyl ether	U	6.6								
4-Chloro-3-methylphenol	U	6.6								
4-Chloroaniline	U	6.6								
4-Chlorophenyl phenyl ether	U	6.6								
4-Nitroaniline	U	6.6								
4-Nitrophenol	U	33								
Acenaphthene	U	6.6								
Acenaphthylene	U	6.6								
Acetophenone	U	6.6								
Anthracene	U	6.6								
Atrazine	U	6.6								
Benz(a)anthracene	U	6.6								
Benzaldehyde	U	6.6								
Benzo(a)pyrene	U	6.6								
Benzo(b)fluoranthene	U	6.6								
Benzo(g,h,i)perylene	U	6.6								
Benzo(k)fluoranthene	U	6.6								
Bis(2-chloroethoxy)methane	U	6.6								
Bis(2-chloroethyl)ether	U	6.6								
Bis(2-chloroisopropyl)ether	U	6.6								
Bis(2-ethylhexyl)phthalate	U	6.6								
Butyl benzyl phthalate	U	6.6								

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: <b>28295</b>		Instrument ID <b>SV-4</b>		Method: <b>SW8270</b>				
Caprolactam	U	6.6						
Carbazole	U	6.6						
Chrysene	U	6.6						
Di-n-butyl phthalate	U	6.6						
Di-n-octyl phthalate	U	6.6						
Dibenz(a,h)anthracene	U	6.6						
Dibenzofuran	U	6.6						
Diethyl phthalate	U	6.6						
Dimethyl phthalate	U	6.6						
Fluoranthene	U	6.6						
Fluorene	U	6.6						
Hexachlorobenzene	U	6.6						
Hexachlorobutadiene	U	6.6						
Hexachlorocyclopentadiene	U	6.6						
Hexachloroethane	U	6.6						
Indeno(1,2,3-cd)pyrene	U	6.6						
Isophorone	U	6.6						
N-Nitrosodi-n-propylamine	U	6.6						
N-Nitrosodiphenylamine	U	6.6						
Naphthalene	U	6.6						
Nitrobenzene	U	6.6						
Pentachlorophenol	U	6.6						
Phenanthrene	U	6.6						
Phenol	U	6.6						
Pyrene	U	6.6						
<i>Surr: 2,4,6-Tribromophenol</i>	<i>145.8</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>87.5</i>	<i>36-126</i>	<i>0</i>	
<i>Surr: 2-Fluorobiphenyl</i>	<i>147.9</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>88.7</i>	<i>43-125</i>	<i>0</i>	
<i>Surr: 2-Fluorophenol</i>	<i>160.6</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>96.4</i>	<i>37-125</i>	<i>0</i>	
<i>Surr: 4-Terphenyl-d14</i>	<i>160.6</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>96.4</i>	<i>32-125</i>	<i>0</i>	
<i>Surr: Nitrobenzene-d5</i>	<i>135.8</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>81.5</i>	<i>37-125</i>	<i>0</i>	
<i>Surr: Phenol-d6</i>	<i>150.7</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>90.4</i>	<i>40-125</i>	<i>0</i>	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 28 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28295** Instrument ID **SV-4** Method: **SW8270**

LCS		Sample ID: <b>SLCSS1-080219</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/20/08 16:53</b>		
Client ID:		Run ID: <b>SV-4_080220A</b>				SeqNo: <b>1332655</b>		Prep Date: <b>2/19/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	135.4	6.6	166.7	0	81.2	40-140	0			
2,4,5-Trichlorophenol	156.4	6.6	166.7	0	93.8	40-140	0			
2,4,6-Trichlorophenol	153.1	6.6	166.7	0	91.9	40-140	0			
2,4-Dichlorophenol	141.8	6.6	166.7	0	85.1	40-140	0			
2,4-Dimethylphenol	163.9	6.6	166.7	0	98.3	40-140	0			
2,4-Dinitrophenol	124.6	33	166.7	0	74.7	40-140	0			
2,4-Dinitrotoluene	150.5	6.6	166.7	0	90.3	40-140	0			
2,6-Dinitrotoluene	154	6.6	166.7	0	92.4	40-140	0			
2-Chloronaphthalene	173.7	6.6	166.7	0	104	40-140	0			
2-Chlorophenol	151.9	6.6	166.7	0	91.1	40-140	0			
2-Methylnaphthalene	142.6	6.6	166.7	0	85.6	43-116	0			
2-Methylphenol	144.9	6.6	166.7	0	86.9	41-115	0			
2-Nitroaniline	140.6	6.6	166.7	0	84.4	40-140	0			
2-Nitrophenol	147.3	6.6	166.7	0	88.4	40-140	0			
3&4-Methylphenol	146.6	6.6	166.7	0	88	40-140	0			
3,3'-Dichlorobenzidine	118.4	6.6	166.7	0	71	40-140	0			
3-Nitroaniline	128.5	6.6	166.7	0	77.1	40-140	0			
4,6-Dinitro-2-methylphenol	140.7	6.6	166.7	0	84.4	40-140	0			
4-Bromophenyl phenyl ether	144.6	6.6	166.7	0	86.8	52-115	0			
4-Chloro-3-methylphenol	159.6	6.6	166.7	0	95.7	40-140	0			
4-Chloroaniline	98.47	6.6	166.7	0	59.1	40-140	0			
4-Chlorophenyl phenyl ether	146.8	6.6	166.7	0	88.1	49-115	0			
4-Nitroaniline	143.5	6.6	166.7	0	86.1	40-140	0			
4-Nitrophenol	159.5	33	166.7	0	95.7	40-140	0			
Acenaphthene	139.3	6.6	166.7	0	83.6	51-115	0			
Acenaphthylene	133.3	6.6	166.7	0	80	51-115	0			
Acetophenone	145.9	6.6	166.7	0	87.6	40-140	0			
Anthracene	142.3	6.6	166.7	0	85.4	55-115	0			
Atrazine	158.4	6.6	166.7	0	95	40-140	0			
Benz(a)anthracene	166.8	6.6	166.7	0	100	48-118	0			
Benzaldehyde	114.6	6.6	166.7	0	68.8	40-140	0			
Benzo(a)pyrene	162.1	6.6	166.7	0	97.3	46-120	0			
Benzo(b)fluoranthene	179.3	6.6	166.7	0	108	42-120	0			
Benzo(g,h,i)perylene	152.9	6.6	166.7	0	91.7	37-132	0			
Benzo(k)fluoranthene	170.5	6.6	166.7	0	102	36-131	0			
Bis(2-chloroethoxy)methane	142.5	6.6	166.7	0	85.5	40-140	0			
Bis(2-chloroethyl)ether	105	6.6	166.7	0	63	40-140	0			
Bis(2-chloroisopropyl)ether	138.7	6.6	166.7	0	83.2	40-140	0			
Bis(2-ethylhexyl)phthalate	159.4	6.6	166.7	0	95.6	38-145	0			
Butyl benzyl phthalate	155.9	6.6	166.7	0	93.5	40-140	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: <b>28295</b>	Instrument ID <b>SV-4</b>		Method: <b>SW8270</b>				
Caprolactam	132.3	6.6	166.7	0	79.4	40-140	0
Carbazole	151.2	6.6	166.7	0	90.7	35-137	0
Chrysene	165.7	6.6	166.7	0	99.4	52-118	0
Di-n-butyl phthalate	151.8	6.6	166.7	0	91.1	40-140	0
Di-n-octyl phthalate	149.7	6.6	166.7	0	89.8	40-140	0
Dibenz(a,h)anthracene	158.6	6.6	166.7	0	95.2	35-133	0
Dibenzofuran	146.8	6.6	166.7	0	88.1	55-115	0
Diethyl phthalate	131.7	6.6	166.7	0	79	40-140	0
Dimethyl phthalate	139.7	6.6	166.7	0	83.8	40-140	0
Fluoranthene	151.2	6.6	166.7	0	90.7	55-117	0
Fluorene	140	6.6	166.7	0	84	52-115	0
Hexachlorobenzene	144.2	6.6	166.7	0	86.5	49-115	0
Hexachlorobutadiene	148.7	6.6	166.7	0	89.2	40-140	0
Hexachlorocyclopentadiene	141.1	6.6	166.7	0	84.6	40-140	0
Hexachloroethane	122.6	6.6	166.7	0	73.6	40-140	0
Indeno(1,2,3-cd)pyrene	154.6	6.6	166.7	0	92.7	35-133	0
Isophorone	132	6.6	166.7	0	79.2	40-140	0
N-Nitrosodi-n-propylamine	141	6.6	166.7	0	84.6	40-140	0
N-Nitrosodiphenylamine	145.4	6.6	166.7	0	87.2	40-140	0
Naphthalene	142.1	6.6	166.7	0	85.3	50-115	0
Nitrobenzene	131.3	6.6	166.7	0	78.8	40-140	0
Pentachlorophenol	166.5	6.6	166.7	0	99.9	20-145	0
Phenanthrene	145.2	6.6	166.7	0	87.1	51-115	0
Phenol	146.2	6.6	166.7	0	87.7	10-110	0
Pyrene	152.9	6.6	166.7	0	91.7	52-115	0
<i>Surr: 2,4,6-Tribromophenol</i>	<i>134.6</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>80.8</i>	<i>36-126</i>	<i>0</i>
<i>Surr: 2-Fluorobiphenyl</i>	<i>137.4</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>82.5</i>	<i>43-125</i>	<i>0</i>
<i>Surr: 2-Fluorophenol</i>	<i>137.9</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>82.7</i>	<i>37-125</i>	<i>0</i>
<i>Surr: 4-Terphenyl-d14</i>	<i>162.1</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>97.3</i>	<i>32-125</i>	<i>0</i>
<i>Surr: Nitrobenzene-d5</i>	<i>138.1</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>82.8</i>	<i>37-125</i>	<i>0</i>
<i>Surr: Phenol-d6</i>	<i>150.7</i>	<i>6.6</i>	<i>166.7</i>	<i>0</i>	<i>90.4</i>	<i>40-125</i>	<i>0</i>

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J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 30 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28295** Instrument ID **SV-4** Method: **SW8270**

MS		Sample ID: <b>0802300-03CMS</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/21/08 14:58</b>		
Client ID: <b>F14-SB-1 (28-30)</b>		Run ID: <b>SV-4_080220A</b>				SeqNo: <b>1332659</b>		Prep Date: <b>2/19/2008</b>		DF: <b>1</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	136.4	6.6	166.4	0	81.9	40-140	0			
2,4,5-Trichlorophenol	148.6	6.6	166.4	0	89.3	40-140	0			
2,4,6-Trichlorophenol	146.8	6.6	166.4	0	88.2	40-140	0			
2,4-Dichlorophenol	148.1	6.6	166.4	0	89	40-140	0			
2,4-Dimethylphenol	142.5	6.6	166.4	0	85.7	40-140	0			
2,4-Dinitrophenol	72.52	33	166.4	0	43.6	40-140	0			
2,4-Dinitrotoluene	148.3	6.6	166.4	0	89.1	40-140	0			
2,6-Dinitrotoluene	157.6	6.6	166.4	0	94.7	40-140	0			
2-Chloronaphthalene	166.9	6.6	166.4	0	100	40-140	0			
2-Chlorophenol	160.6	6.6	166.4	0	96.5	40-140	0			
2-Methylnaphthalene	145.7	6.6	166.4	0	87.5	43-116	0			
2-Methylphenol	139.9	6.6	166.4	0	84.1	41-115	0			
2-Nitroaniline	126.6	6.6	166.4	0	76.1	40-140	0			
2-Nitrophenol	139.9	6.6	166.4	0	84.1	40-140	0			
3&4-Methylphenol	149.5	6.6	166.4	0	89.8	40-140	0			
3,3'-Dichlorobenzidine	125.2	6.6	166.4	0	75.2	40-140	0			
3-Nitroaniline	118.6	6.6	166.4	0	71.3	40-140	0			
4,6-Dinitro-2-methylphenol	81.11	6.6	166.4	0	48.7	40-140	0			
4-Bromophenyl phenyl ether	137.6	6.6	166.4	0	82.7	52-115	0			
4-Chloro-3-methylphenol	162.3	6.6	166.4	0	97.5	40-140	0			
4-Chloroaniline	101.8	6.6	166.4	0	61.2	40-140	0			
4-Chlorophenyl phenyl ether	149.3	6.6	166.4	0	89.7	49-115	0			
4-Nitroaniline	130.4	6.6	166.4	0	78.4	40-140	0			
4-Nitrophenol	169.5	33	166.4	0	102	40-140	0			
Acenaphthene	140.9	6.6	166.4	0	84.7	51-115	0			
Acenaphthylene	131.8	6.6	166.4	0	79.2	51-115	0			
Acetophenone	145.1	6.6	166.4	0	87.2	40-140	0			
Anthracene	139.9	6.6	166.4	0	84.1	55-115	0			
Atrazine	159	6.6	166.4	0	95.5	40-140	0			
Benz(a)anthracene	173.6	6.6	166.4	0	104	48-118	0			
Benzaldehyde	121.7	6.6	166.4	0	73.1	40-140	0			
Benzo(a)pyrene	171.1	6.6	166.4	0	103	46-120	0			
Benzo(b)fluoranthene	169.9	6.6	166.4	0	102	42-120	0			
Benzo(g,h,i)perylene	158.7	6.6	166.4	0	95.4	37-132	0			
Benzo(k)fluoranthene	157.3	6.6	166.4	0	94.6	36-131	0			
Bis(2-chloroethoxy)methane	140.8	6.6	166.4	0	84.6	40-140	0			
Bis(2-chloroethyl)ether	126.7	6.6	166.4	0	76.1	40-140	0			
Bis(2-chloroisopropyl)ether	122	6.6	166.4	0	73.3	40-140	0			
Bis(2-ethylhexyl)phthalate	180.4	6.6	166.4	14.18	99.9	38-145	0			
Butyl benzyl phthalate	178.2	6.6	166.4	0	107	40-140	0			

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QC Page: 31 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: <b>28295</b>		Instrument ID <b>SV-4</b>		Method: <b>SW8270</b>			
Caprolactam	179.2	6.6	166.4	24.84	92.8	40-140	0
Carbazole	148.5	6.6	166.4	0	89.2	35-137	0
Chrysene	165.7	6.6	166.4	0	99.6	52-118	0
Di-n-butyl phthalate	152.1	6.6	166.4	10.79	84.9	40-140	0
Di-n-octyl phthalate	169.9	6.6	166.4	0	102	40-140	0
Dibenz(a,h)anthracene	165.7	6.6	166.4	0	99.6	35-133	0
Dibenzofuran	137.7	6.6	166.4	0	82.8	55-115	0
Diethyl phthalate	135.9	6.6	166.4	0	81.6	40-140	0
Dimethyl phthalate	146.5	6.6	166.4	0	88.1	40-140	0
Fluoranthene	143.7	6.6	166.4	0	86.4	55-117	0
Fluorene	137.6	6.6	166.4	0	82.7	52-115	0
Hexachlorobenzene	136.5	6.6	166.4	0	82	49-115	0
Hexachlorobutadiene	139.5	6.6	166.4	0	83.8	40-140	0
Hexachlorocyclopentadiene	76.72	6.6	166.4	0	46.1	40-140	0
Hexachloroethane	113.4	6.6	166.4	0	68.2	40-140	0
Indeno(1,2,3-cd)pyrene	159.3	6.6	166.4	0	95.7	35-133	0
Isophorone	136	6.6	166.4	0	81.7	40-140	0
N-Nitrosodi-n-propylamine	134.9	6.6	166.4	0	81.1	40-140	0
N-Nitrosodiphenylamine	149.6	6.6	166.4	0	89.9	40-140	0
Naphthalene	133.2	6.6	166.4	0	80	50-115	0
Nitrobenzene	126.7	6.6	166.4	0	76.2	40-140	0
Pentachlorophenol	149.6	6.6	166.4	0	89.9	20-145	0
Phenanthrene	144.4	6.6	166.4	0	86.8	51-115	0
Phenol	149.6	6.6	166.4	0	89.9	10-110	0
Pyrene	167.9	6.6	166.4	0	101	52-115	0
<i>Surr: 2,4,6-Tribromophenol</i>	<i>118.9</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>71.4</i>	<i>36-126</i>	<i>0</i>
<i>Surr: 2-Fluorobiphenyl</i>	<i>130.9</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>78.7</i>	<i>43-125</i>	<i>0</i>
<i>Surr: 2-Fluorophenol</i>	<i>134.2</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>80.6</i>	<i>37-125</i>	<i>0</i>
<i>Surr: 4-Terphenyl-d14</i>	<i>171.5</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>103</i>	<i>32-125</i>	<i>0</i>
<i>Surr: Nitrobenzene-d5</i>	<i>135.5</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>81.5</i>	<i>37-125</i>	<i>0</i>
<i>Surr: Phenol-d6</i>	<i>145.3</i>	<i>6.6</i>	<i>166.4</i>	<i>0</i>	<i>87.3</i>	<i>40-125</i>	<i>0</i>

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R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

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E - Value above quantitation range

QC Page: 32 of 60



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28295** Instrument ID **SV-4** Method: **SW8270**

MSD				Sample ID: <b>0802300-03CMSD</b>			Units: <b>µg/Kg</b>		Analysis Date: <b>02/21/08 15:19</b>	
Client ID: <b>F14-SB-1 (28-30)</b>				Run ID: <b>SV-4_080220A</b>			SeqNo: <b>1332661</b>		Prep Date: <b>2/19/2008</b>	
									DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	139.9	6.6	166.6	0	84	40-140	136.4	2.53	30	
2,4,5-Trichlorophenol	147.8	6.6	166.6	0	88.8	40-140	148.6	0.49	30	
2,4,6-Trichlorophenol	152	6.6	166.6	0	91.2	40-140	146.8	3.48	30	
2,4-Dichlorophenol	149.5	6.6	166.6	0	89.8	40-140	148.1	0.947	30	
2,4-Dimethylphenol	141.6	6.6	166.6	0	85	40-140	142.5	0.654	30	
2,4-Dinitrophenol	95.3	33	166.6	0	57.2	40-140	72.52	27.1	30	
2,4-Dinitrotoluene	146	6.6	166.6	0	87.7	40-140	148.3	1.54	30	
2,6-Dinitrotoluene	156.1	6.6	166.6	0	93.7	40-140	157.6	0.961	30	
2-Chloronaphthalene	167.2	6.6	166.6	0	100	40-140	166.9	0.171	30	
2-Chlorophenol	151.7	6.6	166.6	0	91.1	40-140	160.6	5.67	30	
2-Methylnaphthalene	139	6.6	166.6	0	83.5	43-116	145.7	4.68	30	
2-Methylphenol	141.7	6.6	166.6	0	85.1	41-115	139.9	1.26	30	
2-Nitroaniline	139.5	6.6	166.6	0	83.7	40-140	126.6	9.65	30	
2-Nitrophenol	137.3	6.6	166.6	0	82.4	40-140	139.9	1.87	30	
3&4-Methylphenol	153.6	6.6	166.6	0	92.2	40-140	149.5	2.7	30	
3,3'-Dichlorobenzidine	122.9	6.6	166.6	0	73.8	40-140	125.2	1.89	30	
3-Nitroaniline	124.7	6.6	166.6	0	74.9	40-140	118.6	5.01	30	
4,6-Dinitro-2-methylphenol	95.28	6.6	166.6	0	57.2	40-140	81.11	16.1	30	
4-Bromophenyl phenyl ether	138.8	6.6	166.6	0	83.4	52-115	137.6	0.907	30	
4-Chloro-3-methylphenol	164.6	6.6	166.6	0	98.8	40-140	162.3	1.41	30	
4-Chloroaniline	96.86	6.6	166.6	0	58.2	40-140	101.8	5.02	30	
4-Chlorophenyl phenyl ether	154.6	6.6	166.6	0	92.8	49-115	149.3	3.46	30	
4-Nitroaniline	140.1	6.6	166.6	0	84.1	40-140	130.4	7.13	30	
4-Nitrophenol	156.8	33	166.6	0	94.1	40-140	169.5	7.76	30	
Acenaphthene	145.1	6.6	166.6	0	87.1	51-115	140.9	2.99	30	
Acenaphthylene	134.7	6.6	166.6	0	80.8	51-115	131.8	2.17	30	
Acetophenone	134.5	6.6	166.6	0	80.7	40-140	145.1	7.61	30	
Anthracene	126.5	6.6	166.6	0	75.9	55-115	139.9	10.1	30	
Atrazine	155.6	6.6	166.6	0	93.4	40-140	159	2.14	30	
Benz(a)anthracene	158	6.6	166.6	0	94.9	48-118	173.6	9.44	30	
Benzaldehyde	119.6	6.6	166.6	0	71.8	40-140	121.7	1.7	30	
Benzo(a)pyrene	171.2	6.6	166.6	0	103	46-120	171.1	0.0272	30	
Benzo(b)fluoranthene	176.9	6.6	166.6	0	106	42-120	169.9	4.03	30	
Benzo(g,h,i)perylene	156.7	6.6	166.6	0	94.1	37-132	158.7	1.3	30	
Benzo(k)fluoranthene	161.9	6.6	166.6	0	97.2	36-131	157.3	2.88	30	
Bis(2-chloroethoxy)methane	132.8	6.6	166.6	0	79.8	40-140	140.8	5.84	30	
Bis(2-chloroethyl)ether	126	6.6	166.6	0	75.6	40-140	126.7	0.586	30	
Bis(2-chloroisopropyl)ether	121.9	6.6	166.6	0	73.2	40-140	122	0.0951	30	
Bis(2-ethylhexyl)phthalate	178.4	6.6	166.6	14.18	98.6	38-145	180.4	1.11	30	
Butyl benzyl phthalate	161	6.6	166.6	0	96.6	40-140	178.2	10.2	30	

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**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: <b>28295</b>		Instrument ID <b>SV-4</b>		Method: <b>SW8270</b>					
Caprolactam	208	6.6	166.6	24.84	110	40-140	179.2	14.9	30
Carbazole	143.5	6.6	166.6	0	86.1	35-137	148.5	3.44	30
Chrysene	155.1	6.6	166.6	0	93.1	52-118	165.7	6.62	30
Di-n-butyl phthalate	152.9	6.6	166.6	10.79	85.3	40-140	152.1	0.479	30
Di-n-octyl phthalate	180.5	6.6	166.6	0	108	40-140	169.9	6.04	30
Dibenz(a,h)anthracene	160.5	6.6	166.6	0	96.4	35-133	165.7	3.14	30
Dibenzofuran	145.5	6.6	166.6	0	87.4	55-115	137.7	5.52	30
Diethyl phthalate	145.1	6.6	166.6	0	87.1	40-140	135.9	6.57	30
Dimethyl phthalate	149.2	6.6	166.6	0	89.6	40-140	146.5	1.85	30
Fluoranthene	140.9	6.6	166.6	0	84.6	55-117	143.7	1.94	30
Fluorene	145	6.6	166.6	0	87	52-115	137.6	5.24	30
Hexachlorobenzene	135.8	6.6	166.6	0	81.5	49-115	136.5	0.506	30
Hexachlorobutadiene	128.8	6.6	166.6	0	77.3	40-140	139.5	7.99	30
Hexachlorocyclopentadiene	81.01	6.6	166.6	0	48.6	40-140	76.72	5.45	30
Hexachloroethane	121.1	6.6	166.6	0	72.7	40-140	113.4	6.53	30
Indeno(1,2,3-cd)pyrene	167.1	6.6	166.6	0	100	35-133	159.3	4.78	30
Isophorone	128.4	6.6	166.6	0	77.1	40-140	136	5.7	30
N-Nitrosodi-n-propylamine	139.2	6.6	166.6	0	83.6	40-140	134.9	3.13	30
N-Nitrosodiphenylamine	149.2	6.6	166.6	0	89.6	40-140	149.6	0.315	30
Naphthalene	130.2	6.6	166.6	0	78.2	50-115	133.2	2.25	30
Nitrobenzene	131.5	6.6	166.6	0	78.9	40-140	126.7	3.65	30
Pentachlorophenol	106.2	6.6	166.6	0	63.7	20-145	149.6	34	30 R
Phenanthrene	154.6	6.6	166.6	0	92.8	51-115	144.4	6.8	30
Phenol	153.3	6.6	166.6	0	92	10-110	149.6	2.43	30
Pyrene	152.2	6.6	166.6	0	91.4	52-115	167.9	9.81	30
<i>Surr: 2,4,6-Tribromophenol</i>	<i>131.3</i>	<i>6.6</i>	<i>166.6</i>	<i>0</i>	<i>78.8</i>	<i>36-126</i>	<i>118.9</i>	<i>9.95</i>	<i>30</i>
<i>Surr: 2-Fluorobiphenyl</i>	<i>135.3</i>	<i>6.6</i>	<i>166.6</i>	<i>0</i>	<i>81.2</i>	<i>43-125</i>	<i>130.9</i>	<i>3.32</i>	<i>30</i>
<i>Surr: 2-Fluorophenol</i>	<i>136.2</i>	<i>6.6</i>	<i>166.6</i>	<i>0</i>	<i>81.8</i>	<i>37-125</i>	<i>134.2</i>	<i>1.49</i>	<i>30</i>
<i>Surr: 4-Terphenyl-d14</i>	<i>160.5</i>	<i>6.6</i>	<i>166.6</i>	<i>0</i>	<i>96.4</i>	<i>32-125</i>	<i>171.5</i>	<i>6.62</i>	<i>30</i>
<i>Surr: Nitrobenzene-d5</i>	<i>120.4</i>	<i>6.6</i>	<i>166.6</i>	<i>0</i>	<i>72.3</i>	<i>37-125</i>	<i>135.5</i>	<i>11.8</i>	<i>30</i>
<i>Surr: Phenol-d6</i>	<i>145.7</i>	<i>6.6</i>	<i>166.6</i>	<i>0</i>	<i>87.4</i>	<i>40-125</i>	<i>145.3</i>	<i>0.235</i>	<i>30</i>

The following samples were analyzed in this batch:

0802300-03C	0802300-06C	0802300-07C
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ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28299** Instrument ID **SV-2** Method: **SW8270**

**MBLK** Sample ID: **SBLKW1-080219** Units: **µg/L** Analysis Date: **02/20/08 15:27**

Client ID: Run ID: **SV-2\_080220B** SeqNo: **1334714** Prep Date: **2/19/2008** DF: **1**

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	U	0.20								
2,4,5-Trichlorophenol	U	0.20								
2,4,6-Trichlorophenol	U	0.20								
2,4-Dichlorophenol	U	0.20								
2,4-Dimethylphenol	U	0.20								
2,4-Dinitrophenol	U	1.0								
2,4-Dinitrotoluene	U	0.20								
2,6-Dinitrotoluene	U	0.20								
2-Chloronaphthalene	U	0.20								
2-Chlorophenol	U	0.20								
2-Methylnaphthalene	U	0.20								
2-Methylphenol	U	0.20								
2-Nitroaniline	U	0.20								
2-Nitrophenol	U	0.20								
3&4-Methylphenol	U	0.20								
3,3'-Dichlorobenzidine	U	0.20								
3-Nitroaniline	U	0.20								
4,6-Dinitro-2-methylphenol	U	0.20								
4-Bromophenyl phenyl ether	U	0.20								
4-Chloro-3-methylphenol	U	0.20								
4-Chloroaniline	U	0.20								
4-Chlorophenyl phenyl ether	U	0.20								
4-Nitroaniline	U	0.20								
4-Nitrophenol	U	1.0								
Acenaphthene	U	0.20								
Acenaphthylene	U	0.20								
Acetophenone	U	0.20								
Anthracene	U	0.20								
Atrazine	U	0.20								
Benz(a)anthracene	U	0.20								
Benzaldehyde	U	0.20								
Benzo(a)pyrene	U	0.20								
Benzo(b)fluoranthene	U	0.20								
Benzo(g,h,i)perylene	U	0.20								
Benzo(k)fluoranthene	U	0.20								
Bis(2-chloroethoxy)methane	U	0.20								
Bis(2-chloroethyl)ether	U	0.20								
Bis(2-chloroisopropyl)ether	U	0.20								
Bis(2-ethylhexyl)phthalate	U	0.20								
Butyl benzyl phthalate	U	0.20								

ND - Not Detected at the Reporting Limit

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O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: <b>28299</b>		Instrument ID <b>SV-2</b>		Method: <b>SW8270</b>				
Caprolactam	U	0.20						
Carbazole	U	0.20						
Chrysene	U	0.20						
Di-n-butyl phthalate	U	0.20						
Di-n-octyl phthalate	U	0.20						
Dibenz(a,h)anthracene	U	0.20						
Dibenzofuran	U	0.20						
Diethyl phthalate	U	0.20						
Dimethyl phthalate	U	0.20						
Fluoranthene	U	0.20						
Fluorene	U	0.20						
Hexachlorobenzene	U	0.20						
Hexachlorobutadiene	U	0.20						
Hexachlorocyclopentadiene	U	0.20						
Hexachloroethane	U	0.20						
Indeno(1,2,3-cd)pyrene	U	0.20						
Isophorone	U	0.20						
N-Nitrosodi-n-propylamine	U	0.20						
N-Nitrosodiphenylamine	U	0.20						
Naphthalene	U	0.20						
Nitrobenzene	U	0.20						
Pentachlorophenol	U	0.20						
Phenanthrene	U	0.20						
Phenol	U	0.20						
Pyrene	U	0.20						
<i>Surr: 2,4,6-Tribromophenol</i>	3.128	0.20	5	0	62.6	34-129	0	
<i>Surr: 2-Fluorobiphenyl</i>	3.809	0.20	5	0	76.2	48-115	0	
<i>Surr: 2-Fluorophenol</i>	3.656	0.20	5	0	73.1	32-115	0	
<i>Surr: 4-Terphenyl-d14</i>	3.656	0.20	5	0	73.1	47-117	0	
<i>Surr: Nitrobenzene-d5</i>	3.401	0.20	5	0	68	44-115	0	
<i>Surr: Phenol-d6</i>	3.707	0.20	5	0	74.1	21-119	0	

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E - Value above quantitation range

QC Page: 36 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28299** Instrument ID **SV-2** Method: **SW8270**

LCS		Sample ID: <b>SLCSW1-080219</b>				Units: <b>µg/L</b>		Analysis Date: <b>02/20/08 15:49</b>		
Client ID:		Run ID: <b>SV-2_080220B</b>				SeqNo: <b>1334715</b>		Prep Date: <b>2/19/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	4.074	0.20	5	0	81.5	40-140	0			
2,4,5-Trichlorophenol	4.386	0.20	5	0	87.7	30-130	0			
2,4,6-Trichlorophenol	4.347	0.20	5	0	86.9	30-130	0			
2,4-Dichlorophenol	4.144	0.20	5	0	82.9	30-130	0			
2,4-Dimethylphenol	4.417	0.20	5	0	88.3	50-115	0			
2,4-Dinitrophenol	3.47	1.0	5	0	69.4	30-130	0			
2,4-Dinitrotoluene	4.396	0.20	5	0	87.9	48-125	0			
2,6-Dinitrotoluene	4.256	0.20	5	0	85.1	44-128	0			
2-Chloronaphthalene	4.779	0.20	5	0	95.6	40-140	0			
2-Chlorophenol	4.21	0.20	5	0	84.2	30-130	0			
2-Methylnaphthalene	4.194	0.20	5	0	83.9	50-115	0			
2-Methylphenol	4.03	0.20	5	0	80.6	41-115	0			
2-Nitroaniline	4.245	0.20	5	0	84.9	30-130	0			
2-Nitrophenol	3.972	0.20	5	0	79.4	30-130	0			
3&4-Methylphenol	4.277	0.20	5	0	85.5	27-115	0			
3,3'-Dichlorobenzidine	3.168	0.20	5	0	63.4	30-130	0			
3-Nitroaniline	3.702	0.20	5	0	74	30-130	0			
4,6-Dinitro-2-methylphenol	3.543	0.20	5	0	70.9	30-130	0			
4-Bromophenyl phenyl ether	4.168	0.20	5	0	83.4	50-116	0			
4-Chloro-3-methylphenol	4.309	0.20	5	0	86.2	30-130	0			
4-Chloroaniline	2.951	0.20	5	0	59	30-130	0			
4-Chlorophenyl phenyl ether	4.536	0.20	5	0	90.7	52-116	0			
4-Nitroaniline	4.292	0.20	5	0	85.8	30-130	0			
4-Nitrophenol	4.051	1.0	5	0	81	30-130	0			
Acenaphthene	4.211	0.20	5	0	84.2	51-115	0			
Acenaphthylene	4.321	0.20	5	0	86.4	50-115	0			
Acetophenone	4.008	0.20	5	0	80.2	40-140	0			
Anthracene	4.228	0.20	5	0	84.6	51-119	0			
Atrazine	4.05	0.20	5	0	81	40-140	0			
Benz(a)anthracene	4.295	0.20	5	0	85.9	48-122	0			
Benzaldehyde	3.71	0.20	5	0	74.2	30-130	0			
Benzo(a)pyrene	4.32	0.20	5	0	86.4	46-121	0			
Benzo(b)fluoranthene	4.453	0.20	5	0	89.1	39-126	0			
Benzo(g,h,i)perylene	4.147	0.20	5	0	82.9	42-127	0			
Benzo(k)fluoranthene	4.68	0.20	5	0	93.6	40-127	0			
Bis(2-chloroethoxy)methane	4.119	0.20	5	0	82.4	40-130	0			
Bis(2-chloroethyl)ether	3.963	0.20	5	0	79.3	40-130	0			
Bis(2-chloroisopropyl)ether	3.933	0.20	5	0	78.7	40-130	0			
Bis(2-ethylhexyl)phthalate	4.252	0.20	5	0	85	37-132	0			
Butyl benzyl phthalate	4.182	0.20	5	0	83.6	40-130	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: <b>28299</b>	Instrument ID <b>SV-2</b>		Method: <b>SW8270</b>				
Caprolactam	3.924	0.20	5	0	78.5	30-130	0
Carbazole	4.444	0.20	5	0	88.9	40-128	0
Chrysene	4.23	0.20	5	0	84.6	49-121	0
Di-n-butyl phthalate	4.245	0.20	5	0	84.9	40-140	0
Di-n-octyl phthalate	4.215	0.20	5	0	84.3	40-140	0
Dibenz(a,h)anthracene	4.238	0.20	5	0	84.8	41-128	0
Dibenzofuran	4.295	0.20	5	0	85.9	53-115	0
Diethyl phthalate	4.316	0.20	5	0	86.3	40-140	0
Dimethyl phthalate	4.141	0.20	5	0	82.8	40-140	0
Fluoranthene	4.259	0.20	5	0	85.2	52-120	0
Fluorene	4.177	0.20	5	0	83.5	52-115	0
Hexachlorobenzene	4.165	0.20	5	0	83.3	49-115	0
Hexachlorobutadiene	4.112	0.20	5	0	82.2	40-140	0
Hexachlorocyclopentadiene	4.252	0.20	5	0	85	40-140	0
Hexachloroethane	3.921	0.20	5	0	78.4	40-115	0
Indeno(1,2,3-cd)pyrene	4.247	0.20	5	0	84.9	37-134	0
Isophorone	3.992	0.20	5	0	79.8	40-140	0
N-Nitrosodi-n-propylamine	3.976	0.20	5	0	79.5	40-140	0
N-Nitrosodiphenylamine	4.424	0.20	5	0	88.5	40-140	0
Naphthalene	4.126	0.20	5	0	82.5	51-115	0
Nitrobenzene	4.035	0.20	5	0	80.7	57-115	0
Pentachlorophenol	4.231	0.20	5	0	84.6	19-138	0
Phenanthrene	4.293	0.20	5	0	85.9	53-115	0
Phenol	4.152	0.20	5	0	83	10-110	0
Pyrene	4.38	0.20	5	0	87.6	49-117	0
<i>Surr: 2,4,6-Tribromophenol</i>	3.655	0.20	5	0	73.1	34-129	0
<i>Surr: 2-Fluorobiphenyl</i>	4.106	0.20	5	0	82.1	48-115	0
<i>Surr: 2-Fluorophenol</i>	4.112	0.20	5	0	82.2	32-115	0
<i>Surr: 4-Terphenyl-d14</i>	4.009	0.20	5	0	80.2	47-117	0
<i>Surr: Nitrobenzene-d5</i>	3.66	0.20	5	0	73.2	44-115	0
<i>Surr: Phenol-d6</i>	3.882	0.20	5	0	77.6	21-119	0

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R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **28299** Instrument ID **SV-2** Method: **SW8270**

LCSD		Sample ID: <b>SLCSDW1-080219</b>				Units: <b>µg/L</b>		Analysis Date: <b>02/20/08 16:12</b>		
Client ID:		Run ID: <b>SV-2_080220B</b>				SeqNo: <b>1334716</b>		Prep Date: <b>2/19/2008</b>		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1'-Biphenyl	4.101	0.20	5	0	82	40-140	4.074	0.644	20	
2,4,5-Trichlorophenol	4.424	0.20	5	0	88.5	30-130	4.386	0.866	20	
2,4,6-Trichlorophenol	4.27	0.20	5	0	85.4	30-130	4.347	1.81	20	
2,4-Dichlorophenol	4.203	0.20	5	0	84.1	30-130	4.144	1.42	20	
2,4-Dimethylphenol	4.47	0.20	5	0	89.4	50-115	4.417	1.2	20	
2,4-Dinitrophenol	3.597	1.0	5	0	71.9	30-130	3.47	3.61	20	
2,4-Dinitrotoluene	4.176	0.20	5	0	83.5	48-125	4.396	5.13	20	
2,6-Dinitrotoluene	3.985	0.20	5	0	79.7	44-128	4.256	6.59	20	
2-Chloronaphthalene	4.344	0.20	5	0	86.9	40-140	4.779	9.52	20	
2-Chlorophenol	4.378	0.20	5	0	87.6	30-130	4.21	3.9	20	
2-Methylnaphthalene	3.999	0.20	5	0	80	50-115	4.194	4.76	20	
2-Methylphenol	4.313	0.20	5	0	86.3	41-115	4.03	6.78	20	
2-Nitroaniline	3.915	0.20	5	0	78.3	30-130	4.245	8.09	20	
2-Nitrophenol	3.77	0.20	5	0	75.4	30-130	3.972	5.22	20	
3&4-Methylphenol	4.349	0.20	5	0	87	27-115	4.277	1.67	20	
3,3'-Dichlorobenzidine	3.137	0.20	5	0	62.7	30-130	3.168	0.998	20	
3-Nitroaniline	3.788	0.20	5	0	75.8	30-130	3.702	2.28	20	
4,6-Dinitro-2-methylphenol	3.693	0.20	5	0	73.9	30-130	3.543	4.14	20	
4-Bromophenyl phenyl ether	3.879	0.20	5	0	77.6	50-116	4.168	7.17	20	
4-Chloro-3-methylphenol	4.2	0.20	5	0	84	30-130	4.309	2.58	20	
4-Chloroaniline	2.81	0.20	5	0	56.2	30-130	2.951	4.91	20	
4-Chlorophenyl phenyl ether	4.075	0.20	5	0	81.5	52-116	4.536	10.7	20	
4-Nitroaniline	4.308	0.20	5	0	86.2	30-130	4.292	0.359	20	
4-Nitrophenol	3.74	1.0	5	0	74.8	30-130	4.051	8.01	20	
Acenaphthene	4.105	0.20	5	0	82.1	51-115	4.211	2.57	20	
Acenaphthylene	4.112	0.20	5	0	82.2	50-115	4.321	4.96	20	
Acetophenone	3.812	0.20	5	0	76.2	40-140	4.008	5.01	20	
Anthracene	3.949	0.20	5	0	79	51-119	4.228	6.82	20	
Atrazine	4.162	0.20	5	0	83.2	40-140	4.05	2.72	20	
Benz(a)anthracene	4.365	0.20	5	0	87.3	48-122	4.295	1.63	20	
Benzaldehyde	3.461	0.20	5	0	69.2	30-130	3.71	6.93	20	
Benzo(a)pyrene	4.499	0.20	5	0	90	46-121	4.32	4.06	20	
Benzo(b)fluoranthene	4.536	0.20	5	0	90.7	39-126	4.453	1.84	20	
Benzo(g,h,i)perylene	4.476	0.20	5	0	89.5	42-127	4.147	7.63	20	
Benzo(k)fluoranthene	4.78	0.20	5	0	95.6	40-127	4.68	2.13	20	
Bis(2-chloroethoxy)methane	4.025	0.20	5	0	80.5	40-130	4.119	2.31	20	
Bis(2-chloroethyl)ether	3.968	0.20	5	0	79.4	40-130	3.963	0.13	20	
Bis(2-chloroisopropyl)ether	3.868	0.20	5	0	77.4	40-130	3.933	1.68	20	
Bis(2-ethylhexyl)phthalate	4.353	0.20	5	0	87.1	37-132	4.252	2.33	20	
Butyl benzyl phthalate	4.099	0.20	5	0	82	40-130	4.182	2.01	20	

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: <b>28299</b>		Instrument ID <b>SV-2</b>		Method: <b>SW8270</b>					
Caprolactam	4.207	0.20	5	0	84.1	30-130	3.924	6.95	20
Carbazole	4.199	0.20	5	0	84	40-128	4.444	5.67	20
Chrysene	4.223	0.20	5	0	84.5	49-121	4.23	0.154	20
Di-n-butyl phthalate	4.04	0.20	5	0	80.8	40-140	4.245	4.94	20
Di-n-octyl phthalate	4.205	0.20	5	0	84.1	40-140	4.215	0.249	20
Dibenz(a,h)anthracene	4.217	0.20	5	0	84.3	41-128	4.238	0.51	20
Dibenzofuran	4.143	0.20	5	0	82.9	53-115	4.295	3.61	20
Diethyl phthalate	4.216	0.20	5	0	84.3	40-140	4.316	2.36	20
Dimethyl phthalate	4.05	0.20	5	0	81	40-140	4.141	2.21	20
Fluoranthene	4.006	0.20	5	0	80.1	52-120	4.259	6.13	20
Fluorene	4.122	0.20	5	0	82.4	52-115	4.177	1.32	20
Hexachlorobenzene	4.082	0.20	5	0	81.6	49-115	4.165	2	20
Hexachlorobutadiene	4.195	0.20	5	0	83.9	40-140	4.112	2	20
Hexachlorocyclopentadiene	4.01	0.20	5	0	80.2	40-140	4.252	5.86	20
Hexachloroethane	3.975	0.20	5	0	79.5	40-115	3.921	1.35	20
Indeno(1,2,3-cd)pyrene	4.086	0.20	5	0	81.7	37-134	4.247	3.85	20
Isophorone	3.831	0.20	5	0	76.6	40-140	3.992	4.11	20
N-Nitrosodi-n-propylamine	4.241	0.20	5	0	84.8	40-140	3.976	6.46	20
N-Nitrosodiphenylamine	4.122	0.20	5	0	82.4	40-140	4.424	7.06	20
Naphthalene	3.961	0.20	5	0	79.2	51-115	4.126	4.08	20
Nitrobenzene	3.776	0.20	5	0	75.5	57-115	4.035	6.63	20
Pentachlorophenol	3.902	0.20	5	0	78	19-138	4.231	8.1	20
Phenanthrene	4.175	0.20	5	0	83.5	53-115	4.293	2.79	20
Phenol	4.217	0.20	5	0	84.3	10-110	4.152	1.55	20
Pyrene	4.307	0.20	5	0	86.1	49-117	4.38	1.68	20
<i>Surr: 2,4,6-Tribromophenol</i>	<i>3.504</i>	<i>0.20</i>	<i>5</i>	<i>0</i>	<i>70.1</i>	<i>34-129</i>	<i>3.655</i>	<i>4.2</i>	<i>20</i>
<i>Surr: 2-Fluorobiphenyl</i>	<i>3.875</i>	<i>0.20</i>	<i>5</i>	<i>0</i>	<i>77.5</i>	<i>48-115</i>	<i>4.106</i>	<i>5.8</i>	<i>20</i>
<i>Surr: 2-Fluorophenol</i>	<i>4.113</i>	<i>0.20</i>	<i>5</i>	<i>0</i>	<i>82.3</i>	<i>32-115</i>	<i>4.112</i>	<i>0.0415</i>	<i>20</i>
<i>Surr: 4-Terphenyl-d14</i>	<i>3.779</i>	<i>0.20</i>	<i>5</i>	<i>0</i>	<i>75.6</i>	<i>47-117</i>	<i>4.009</i>	<i>5.9</i>	<i>20</i>
<i>Surr: Nitrobenzene-d5</i>	<i>3.702</i>	<i>0.20</i>	<i>5</i>	<i>0</i>	<i>74</i>	<i>44-115</i>	<i>3.66</i>	<i>1.16</i>	<i>20</i>
<i>Surr: Phenol-d6</i>	<i>3.867</i>	<i>0.20</i>	<i>5</i>	<i>0</i>	<i>77.3</i>	<i>21-119</i>	<i>3.882</i>	<i>0.4</i>	<i>20</i>

The following samples were analyzed in this batch:

0802300-09C 0802300-10C

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: **R60091** Instrument ID **VOA2** Method: **SW8260**

**MBLK** Sample ID: **VBLKW-021908** Units: **µg/L** Analysis Date: **02/19/08 16:57**

Client ID: Run ID: **VOA2\_080219A** SeqNo: **1330902** Prep Date: DF: 1

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	U	5.0								
1,1,2,2-Tetrachloroethane	U	5.0								
1,1,2-Trichlor-1,2,2-trifluoroethane	U	5.0								
1,1,2-Trichloroethane	U	5.0								
1,1-Dichloroethane	U	5.0								
1,1-Dichloroethene	U	5.0								
1,2,4-Trichlorobenzene	U	5.0								
1,2-Dibromo-3-chloropropane	U	5.0								
1,2-Dibromoethane	U	5.0								
1,2-Dichlorobenzene	U	5.0								
1,2-Dichloroethane	U	5.0								
1,2-Dichloropropane	U	5.0								
1,3-Dichlorobenzene	U	5.0								
1,4-Dichlorobenzene	U	5.0								
2-Butanone	U	10								
2-Hexanone	U	10								
4-Methyl-2-pentanone	U	10								
Acetone	U	10								
Benzene	U	5.0								
Bromodichloromethane	U	5.0								
Bromoform	U	5.0								
Bromomethane	U	5.0								
Carbon disulfide	U	10								
Carbon tetrachloride	U	5.0								
Chlorobenzene	U	5.0								
Chloroethane	U	5.0								
Chloroform	U	5.0								
Chloromethane	U	5.0								
cis-1,2-Dichloroethene	U	5.0								
cis-1,3-Dichloropropene	U	5.0								
Cyclohexane	U	5.0								
Dibromochloromethane	U	5.0								
Dichlorodifluoromethane	U	5.0								
Ethylbenzene	U	5.0								
Isopropylbenzene	U	5.0								
Methyl acetate	U	5.0								
Methyl tert-butyl ether	U	5.0								
Methylcyclohexane	U	5.0								
Styrene	U	5.0								
Tetrachloroethene	U	5.0								

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 41 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: <b>R60091</b>		Instrument ID <b>VOA2</b>		Method: <b>SW8260</b>				
Toluene	U	5.0						
trans-1,2-Dichloroethene	U	5.0						
trans-1,3-Dichloropropene	U	5.0						
Trichloroethene	U	5.0						
Trichlorofluoromethane	U	5.0						
Vinyl chloride	U	2.0						
Xylenes, Total	U	15						
<i>Surr: 1,2-Dichloroethane-d4</i>	<i>44.17</i>	<i>5.0</i>	<i>50</i>	<i>0</i>	<i>88.3</i>	<i>70-125</i>	<i>0</i>	
<i>Surr: 4-Bromofluorobenzene</i>	<i>43.65</i>	<i>5.0</i>	<i>50</i>	<i>0</i>	<i>87.3</i>	<i>72-125</i>	<i>0</i>	
<i>Surr: Dibromofluoromethane</i>	<i>43.27</i>	<i>5.0</i>	<i>50</i>	<i>0</i>	<i>86.5</i>	<i>71-125</i>	<i>0</i>	
<i>Surr: Toluene-d8</i>	<i>46.04</i>	<i>5.0</i>	<i>50</i>	<i>0</i>	<i>92.1</i>	<i>75-125</i>	<i>0</i>	

ND - Not Detected at the Reporting Limit	S - Spike Recovery outside accepted recovery limits	B - Analyte detected in assoc. Method Blank
J - Analyte detected below quantitation limits	R - RPD outside accepted recovery limits	U - Analyzed for but not detected
O - Referenced analyte value is > 4 times amount spiked	P - Dual Column results percent difference > 40%	E - Value above quantitation range

QC Page: 42 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **R60091** Instrument ID **VOA2** Method: **SW8260**

LCS		Sample ID: <b>VLCSW-021908</b>		Units: <b>µg/L</b>		Analysis Date: <b>02/19/08 16:09</b>				
Client ID:		Run ID: <b>VOA2_080219A</b>		SeqNo: <b>1330901</b>		Prep Date:		DF: 1		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	49.52	5.0	50	0	99	80-120	0			
1,1,2,2-Tetrachloroethane	49.69	5.0	50	0	99.4	72-120	0			
1,1,2-Trichlor-1,2,2-trifluoroethane	44.12	5.0	50	0	88.2	73-123	0			
1,1,2-Trichloroethane	47.63	5.0	50	0	95.3	80-120	0			
1,1-Dichloroethane	47.27	5.0	50	0	94.5	76-120	0			
1,1-Dichloroethene	46.27	5.0	50	0	92.5	73-124	0			
1,2,4-Trichlorobenzene	49.09	5.0	50	0	98.2	80-120	0			
1,2-Dibromo-3-chloropropane	54.93	5.0	50	0	110	65-125	0			
1,2-Dibromoethane	49.6	5.0	50	0	99.2	80-120	0			
1,2-Dichlorobenzene	48.68	5.0	50	0	97.4	80-120	0			
1,2-Dichloroethane	49.42	5.0	50	0	98.8	78-120	0			
1,2-Dichloropropane	48.13	5.0	50	0	96.3	80-120	0			
1,3-Dichlorobenzene	47.16	5.0	50	0	94.3	80-120	0			
1,4-Dichlorobenzene	46.49	5.0	50	0	93	80-120	0			
2-Butanone	105.1	10	100	0	105	58-132	0			
2-Hexanone	106	10	100	0	106	61-130	0			
4-Methyl-2-pentanone	103.1	10	100	0	103	65-127	0			
Acetone	95.86	10	100	0	95.9	59-137	0			
Benzene	47.5	5.0	50	0	95	73-121	0			
Bromodichloromethane	50.47	5.0	50	0	101	80-120	0			
Bromoform	49.4	5.0	50	0	98.8	79-120	0			
Bromomethane	50.09	5.0	50	0	100	66-137	0			
Carbon disulfide	95.71	10	100	0	95.7	68-141	0			
Carbon tetrachloride	43.31	5.0	50	0	86.6	75-124	0			
Chlorobenzene	47.36	5.0	50	0	94.7	80-120	0			
Chloroethane	47.84	5.0	50	0	95.7	76-121	0			
Chloroform	49.33	5.0	50	0	98.7	80-120	0			
Chloromethane	51.6	5.0	50	0	103	67-123	0			
cis-1,2-Dichloroethene	48.34	5.0	50	0	96.7	78-120	0			
cis-1,3-Dichloropropene	52.86	5.0	50	0	106	80-120	0			
Cyclohexane	42.07	5.0	50	0	84.1	66-125	0			
Dibromochloromethane	52.27	5.0	50	0	105	80-120	0			
Dichlorodifluoromethane	46.76	5.0	50	0	93.5	63-125	0			
Ethylbenzene	48.04	5.0	50	0	96.1	80-120	0			
Isopropylbenzene	48.19	5.0	50	0	96.4	80-120	0			
Methyl acetate	48.59	5.0	50	0	97.2	60-130	0			
Methyl tert-butyl ether	51.46	5.0	50	0	103	73-121	0			
Methylcyclohexane	42.02	5.0	50	0	84	75-122	0			
Styrene	49.08	5.0	50	0	98.2	80-120	0			
Tetrachloroethene	45.52	5.0	50	0	91	79-120	0			

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: <b>R60091</b>		Instrument ID <b>VOA2</b>		Method: <b>SW8260</b>			
Toluene	48.67	5.0	50	0	97.3	80-120	0
trans-1,2-Dichloroethene	47.81	5.0	50	0	95.6	78-120	0
trans-1,3-Dichloropropene	52.02	5.0	50	0	104	80-120	0
Trichloroethene	48.48	5.0	50	0	97	80-120	0
Trichlorofluoromethane	46.05	5.0	50	0	92.1	72-130	0
Vinyl chloride	47.99	2.0	50	0	96	70-127	0
Xylenes, Total	143.6	15	150	0	95.7	80-120	0
<i>Surr: 1,2-Dichloroethane-d4</i>	<i>42</i>	<i>5.0</i>	<i>50</i>	<i>0</i>	<i>84</i>	<i>70-125</i>	<i>0</i>
<i>Surr: 4-Bromofluorobenzene</i>	<i>43.72</i>	<i>5.0</i>	<i>50</i>	<i>0</i>	<i>87.4</i>	<i>72-125</i>	<i>0</i>
<i>Surr: Dibromofluoromethane</i>	<i>44.11</i>	<i>5.0</i>	<i>50</i>	<i>0</i>	<i>88.2</i>	<i>71-125</i>	<i>0</i>
<i>Surr: Toluene-d8</i>	<i>44.95</i>	<i>5.0</i>	<i>50</i>	<i>0</i>	<i>89.9</i>	<i>75-125</i>	<i>0</i>

ND - Not Detected at the Reporting Limit

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R - RPD outside accepted recovery limits

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E - Value above quantitation range

QC Page: 44 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **R60091** Instrument ID **VOA2** Method: **SW8260**

MS		Sample ID: <b>0802352-01AMS</b>				Units: <b>µg/L</b>		Analysis Date: <b>02/19/08 18:34</b>		
Client ID:		Run ID: <b>VOA2_080219A</b>				SeqNo: <b>1330905</b>		Prep Date:		DF: <b>5</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	227.5	25	250	0	91	80-120	0			
1,1,2,2-Tetrachloroethane	257.7	25	250	0	103	72-120	0			
1,1,2-Trichlor-1,2,2-trifluoroethane	210.9	25	250	0	84.4	73-123	0			
1,1,2-Trichloroethane	243.9	25	250	0	97.6	80-120	0			
1,1-Dichloroethane	233.6	25	250	0	93.4	76-120	0			
1,1-Dichloroethene	222.3	25	250	0	88.9	73-124	0			
1,2,4-Trichlorobenzene	233.4	25	250	0	93.4	80-120	0			
1,2-Dibromo-3-chloropropane	247.2	25	250	0	98.9	65-125	0			
1,2-Dibromoethane	256.6	25	250	0	103	80-120	0			
1,2-Dichlorobenzene	235.5	25	250	0	94.2	80-120	0			
1,2-Dichloroethane	445.8	25	250	208.8	94.8	78-120	0			
1,2-Dichloropropane	243.5	25	250	0	97.4	80-120	0			
1,3-Dichlorobenzene	231.4	25	250	0	92.6	80-120	0			
1,4-Dichlorobenzene	223.8	25	250	0	89.5	80-120	0			
2-Butanone	512.4	50	500	0	102	58-132	0			
2-Hexanone	521.4	50	500	0	104	61-130	0			
4-Methyl-2-pentanone	544	50	500	0	109	65-127	0			
Acetone	467.3	50	500	0	93.5	59-137	0			
Benzene	240.7	25	250	1.727	95.6	73-121	0			
Bromodichloromethane	248.5	25	250	0	99.4	80-120	0			
Bromoform	251.2	25	250	0	100	79-120	0			
Bromomethane	247.5	25	250	0	99	66-137	0			
Carbon disulfide	456.3	50	500	0	91.3	68-141	0			
Carbon tetrachloride	196.5	25	250	0	78.6	75-124	0			
Chlorobenzene	235.4	25	250	0	94.2	80-120	0			
Chloroethane	243.2	25	250	0	97.3	76-121	0			
Chloroform	234.5	25	250	0	93.8	80-120	0			
Chloromethane	266.6	25	250	0	107	67-123	0			
cis-1,2-Dichloroethene	244.1	25	250	0	97.6	78-120	0			
cis-1,3-Dichloropropene	254.7	25	250	0	102	80-120	0			
Cyclohexane	211.1	25	250	0	84.4	66-125	0			
Dibromochloromethane	253.5	25	250	0	101	80-120	0			
Dichlorodifluoromethane	221.7	25	250	0	88.7	63-125	0			
Ethylbenzene	230.4	25	250	0	92.1	80-120	0			
Isopropylbenzene	231	25	250	0	92.4	80-120	0			
Methyl acetate	260.6	25	250	0	104	60-130	0			
Methyl tert-butyl ether	287.5	25	250	33.46	102	73-121	0			
Methylcyclohexane	214.5	25	250	0	85.8	75-122	0			
Styrene	235.9	25	250	0	94.3	80-120	0			
Tetrachloroethene	211.8	25	250	0	84.7	79-120	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 45 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: <b>R60091</b>		Instrument ID <b>VOA2</b>		Method: <b>SW8260</b>			
Toluene	236.4	25	250	0	94.6	80-120	0
trans-1,2-Dichloroethene	233.3	25	250	0	93.3	78-120	0
trans-1,3-Dichloropropene	252.8	25	250	0	101	80-120	0
Trichloroethene	230.8	25	250	0	92.3	80-120	0
Trichlorofluoromethane	216.3	25	250	0	86.5	72-130	0
Vinyl chloride	230	10	250	0	92	70-127	0
Xylenes, Total	697.4	75	750	0	93	80-120	0
<i>Surr: 1,2-Dichloroethane-d4</i>	<i>205</i>	<i>25</i>	<i>250</i>	<i>0</i>	<i>82</i>	<i>70-125</i>	<i>0</i>
<i>Surr: 4-Bromofluorobenzene</i>	<i>214.8</i>	<i>25</i>	<i>250</i>	<i>0</i>	<i>85.9</i>	<i>72-125</i>	<i>0</i>
<i>Surr: Dibromofluoromethane</i>	<i>213.3</i>	<i>25</i>	<i>250</i>	<i>0</i>	<i>85.3</i>	<i>71-125</i>	<i>0</i>
<i>Surr: Toluene-d8</i>	<i>225.9</i>	<i>25</i>	<i>250</i>	<i>0</i>	<i>90.3</i>	<i>75-125</i>	<i>0</i>

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 46 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **R60091** Instrument ID **VOA2** Method: **SW8260**

MSD		Sample ID: <b>0802352-01AMSD</b>				Units: <b>µg/L</b>		Analysis Date: <b>02/19/08 18:59</b>		
Client ID:		Run ID: <b>VOA2_080219A</b>				SeqNo: <b>1330906</b>		Prep Date:		DF: <b>5</b>
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	228.4	25	250	0	91.4	80-120	227.5	0.387	20	
1,1,2,2-Tetrachloroethane	260.1	25	250	0	104	72-120	257.7	0.905	20	
1,1,2-Trichlor-1,2,2-trifluoroethane	189.3	25	250	0	75.7	73-123	210.9	10.8	20	
1,1,2-Trichloroethane	248.3	25	250	0	99.3	80-120	243.9	1.78	20	
1,1-Dichloroethane	236.4	25	250	0	94.5	76-120	233.6	1.18	20	
1,1-Dichloroethene	226.1	25	250	0	90.4	73-124	222.3	1.68	20	
1,2,4-Trichlorobenzene	209.7	25	250	0	83.9	80-120	233.4	10.7	20	
1,2-Dibromo-3-chloropropane	285.3	25	250	0	114	65-125	247.2	14.3	20	
1,2-Dibromoethane	250.8	25	250	0	100	80-120	256.6	2.3	20	
1,2-Dichlorobenzene	231	25	250	0	92.4	80-120	235.5	1.94	20	
1,2-Dichloroethane	435.2	25	250	208.8	90.6	78-120	445.8	2.41	20	
1,2-Dichloropropane	242.9	25	250	0	97.2	80-120	243.5	0.241	20	
1,3-Dichlorobenzene	220.3	25	250	0	88.1	80-120	231.4	4.9	20	
1,4-Dichlorobenzene	216.8	25	250	0	86.7	80-120	223.8	3.21	20	
2-Butanone	533.4	50	500	0	107	58-132	512.4	4.01	20	
2-Hexanone	551	50	500	0	110	61-130	521.4	5.52	20	
4-Methyl-2-pentanone	543.4	50	500	0	109	65-127	544	0.107	20	
Acetone	477.3	50	500	0	95.5	59-137	467.3	2.13	20	
Benzene	238.2	25	250	1.727	94.6	73-121	240.7	1.05	20	
Bromodichloromethane	255.7	25	250	0	102	80-120	248.5	2.86	20	
Bromoform	245.6	25	250	0	98.2	79-120	251.2	2.25	20	
Bromomethane	254.8	25	250	0	102	66-137	247.5	2.92	20	
Carbon disulfide	458.8	50	500	0	91.8	68-141	456.3	0.549	20	
Carbon tetrachloride	193	25	250	0	77.2	75-124	196.5	1.78	20	
Chlorobenzene	231.5	25	250	0	92.6	80-120	235.4	1.69	20	
Chloroethane	243.8	25	250	0	97.5	76-121	243.2	0.239	20	
Chloroform	241.4	25	250	0	96.6	80-120	234.5	2.89	20	
Chloromethane	264.8	25	250	0	106	67-123	266.6	0.643	20	
cis-1,2-Dichloroethene	248.7	25	250	0	99.5	78-120	244.1	1.88	20	
cis-1,3-Dichloropropene	254.4	25	250	0	102	80-120	254.7	0.1	20	
Cyclohexane	184.3	25	250	0	73.7	66-125	211.1	13.5	20	
Dibromochloromethane	255.7	25	250	0	102	80-120	253.5	0.848	20	
Dichlorodifluoromethane	212.8	25	250	0	85.1	63-125	221.7	4.13	20	
Ethylbenzene	219.6	25	250	0	87.8	80-120	230.4	4.78	20	
Isopropylbenzene	208.1	25	250	0	83.2	80-120	231	10.4	20	
Methyl acetate	261.2	25	250	0	104	60-130	260.6	0.215	20	
Methyl tert-butyl ether	291.8	25	250	33.46	103	73-121	287.5	1.47	20	
Methylcyclohexane	172.9	25	250	0	69.2	75-122	214.5	21.5	20	SR
Styrene	227	25	250	0	90.8	80-120	235.9	3.84	20	
Tetrachloroethene	204.6	25	250	0	81.9	79-120	211.8	3.42	20	

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: <b>R60091</b>		Instrument ID <b>VOA2</b>		Method: <b>SW8260</b>					
Toluene	233	25	250	0	93.2	80-120	236.4	1.45	20
trans-1,2-Dichloroethene	238.5	25	250	0	95.4	78-120	233.3	2.23	20
trans-1,3-Dichloropropene	256.8	25	250	0	103	80-120	252.8	1.59	20
Trichloroethene	225.8	25	250	0	90.3	80-120	230.8	2.17	20
Trichlorofluoromethane	207	25	250	0	82.8	72-130	216.3	4.38	20
Vinyl chloride	237	10	250	0	94.8	70-127	230	3	20
Xylenes, Total	664.7	75	750	0	88.6	80-120	697.4	4.8	20
<i>Surr: 1,2-Dichloroethane-d4</i>	206.5	25	250	0	82.6	70-125	205	0.758	20
<i>Surr: 4-Bromofluorobenzene</i>	215.4	25	250	0	86.2	72-125	214.8	0.296	20
<i>Surr: Dibromofluoromethane</i>	219.2	25	250	0	87.7	71-125	213.3	2.76	20
<i>Surr: Toluene-d8</i>	223.5	25	250	0	89.4	75-125	225.9	1.05	20

The following samples were analyzed in this batch:

0802300-09A	0802300-10A	0802300-11A
0802300-12A	0802300-13A	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 48 of 60



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **R60280** Instrument ID **VOA3** Method: **SW8260**

**MBLK** Sample ID: **VBLKS-022508** Units: **µg/Kg** Analysis Date: **02/25/08 13:48**  
 Client ID: Run ID: **VOA3\_080225A** SeqNo: **1334671** Prep Date: DF: 1

Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	U	5.0								
1,1,2,2-Tetrachloroethane	U	5.0								
1,1,2-Trichlor-1,2,2-trifluoroethane	U	5.0								
1,1,2-Trichloroethane	U	5.0								
1,1-Dichloroethane	U	5.0								
1,1-Dichloroethene	U	5.0								
1,2,4-Trichlorobenzene	U	5.0								
1,2-Dibromo-3-chloropropane	U	5.0								
1,2-Dibromoethane	U	5.0								
1,2-Dichlorobenzene	U	5.0								
1,2-Dichloroethane	U	5.0								
1,2-Dichloropropane	U	5.0								
1,3-Dichlorobenzene	U	5.0								
1,4-Dichlorobenzene	U	5.0								
2-Butanone	U	10								
2-Hexanone	U	10								
4-Methyl-2-pentanone	U	10								
Acetone	U	20								
Benzene	U	5.0								
Bromodichloromethane	U	5.0								
Bromoform	U	5.0								
Bromomethane	U	10								
Carbon disulfide	U	10								
Carbon tetrachloride	U	5.0								
Chlorobenzene	U	5.0								
Chloroethane	U	10								
Chloroform	U	5.0								
Chloromethane	U	10								
cis-1,2-Dichloroethene	U	5.0								
cis-1,3-Dichloropropene	U	5.0								
Cyclohexane	U	5.0								
Dibromochloromethane	U	5.0								
Dichlorodifluoromethane	U	5.0								
Ethylbenzene	U	5.0								
Isopropylbenzene	U	5.0								
Methyl acetate	U	5.0								
Methyl tert-butyl ether	U	5.0								
Methylcyclohexane	U	5.0								
Styrene	U	5.0								
Tetrachloroethene	U	5.0								

ND - Not Detected at the Reporting Limit S - Spike Recovery outside accepted recovery limits B - Analyte detected in assoc. Method Blank  
 J - Analyte detected below quantitation limits R - RPD outside accepted recovery limits U - Analyzed for but not detected  
 O - Referenced analyte value is > 4 times amount spiked P - Dual Column results percent difference > 40% E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: <b>R60280</b>		Instrument ID <b>VOA3</b>		Method: <b>SW8260</b>				
Toluene	U	5.0						
trans-1,2-Dichloroethene	U	5.0						
trans-1,3-Dichloropropene	U	5.0						
Trichloroethene	U	5.0						
Trichlorofluoromethane	U	5.0						
Vinyl chloride	U	2.0						
Xylenes, Total	U	15						
<i>Surr: 1,2-Dichloroethane-d4</i>	<i>53.37</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>107</i>	<i>70-128</i>	<i>0</i>	
<i>Surr: 4-Bromofluorobenzene</i>	<i>54.52</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>109</i>	<i>73-126</i>	<i>0</i>	
<i>Surr: Dibromofluoromethane</i>	<i>52.99</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>106</i>	<i>71-128</i>	<i>0</i>	
<i>Surr: Toluene-d8</i>	<i>53.78</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>108</i>	<i>73-127</i>	<i>0</i>	

ND - Not Detected at the Reporting Limit	S - Spike Recovery outside accepted recovery limits	B - Analyte detected in assoc. Method Blank
J - Analyte detected below quantitation limits	R - RPD outside accepted recovery limits	U - Analyzed for but not detected
O - Referenced analyte value is > 4 times amount spiked	P - Dual Column results percent difference > 40%	E - Value above quantitation range

QC Page: 50 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **R60280** Instrument ID **VOA3** Method: **SW8260**

LCS		Sample ID: <b>VLCSS-022508</b>		Units: <b>µg/Kg</b>			Analysis Date: <b>02/25/08 12:53</b>			
Client ID:		Run ID: <b>VOA3_080225A</b>		SeqNo: <b>1334670</b>		Prep Date:		DF: 1		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	50.93	5.0	50	0	102	79-124	0			
1,1,2,2-Tetrachloroethane	49.74	5.0	50	0	99.5	75-123	0			
1,1,2-Trichlor-1,2,2-trifluoroethane	53.62	5.0	50	0	107	79-125	0			
1,1,2-Trichloroethane	48.11	5.0	50	0	96.2	79-120	0			
1,1-Dichloroethane	49.4	5.0	50	0	98.8	75-124	0			
1,1-Dichloroethene	53.02	5.0	50	0	106	80-122	0			
1,2,4-Trichlorobenzene	49.77	5.0	50	0	99.5	74-128	0			
1,2-Dibromo-3-chloropropane	46.69	5.0	50	0	93.4	66-129	0			
1,2-Dibromoethane	47.1	5.0	50	0	94.2	79-120	0			
1,2-Dichlorobenzene	48.35	5.0	50	0	96.7	79-120	0			
1,2-Dichloroethane	48.42	5.0	50	0	96.8	73-121	0			
1,2-Dichloropropane	49.09	5.0	50	0	98.2	76-120	0			
1,3-Dichlorobenzene	49.85	5.0	50	0	99.7	79-120	0			
1,4-Dichlorobenzene	49.95	5.0	50	0	99.9	77-120	0			
2-Butanone	91.37	10	100	0	91.4	65-130	0			
2-Hexanone	93.93	10	100	0	93.9	65-133	0			
4-Methyl-2-pentanone	91	10	100	0	91	69-130	0			
Acetone	94.56	20	100	0	94.6	53-142	0			
Benzene	48.88	5.0	50	0	97.8	79-120	0			
Bromodichloromethane	49.43	5.0	50	0	98.9	79-121	0			
Bromoform	47.48	5.0	50	0	95	74-122	0			
Bromomethane	45.86	10	50	0	91.7	68-131	0			
Carbon disulfide	101.9	10	100	0	102	80-124	0			
Carbon tetrachloride	49.39	5.0	50	0	98.8	74-126	0			
Chlorobenzene	47.66	5.0	50	0	95.3	79-120	0			
Chloroethane	52.96	10	50	0	106	76-126	0			
Chloroform	49.76	5.0	50	0	99.5	78-120	0			
Chloromethane	47.7	10	50	0	95.4	69-129	0			
cis-1,2-Dichloroethene	49.4	5.0	50	0	98.8	80-120	0			
cis-1,3-Dichloropropene	49.65	5.0	50	0	99.3	77-123	0			
Cyclohexane	54.83	5.0	50	0	110	74-126	0			
Dibromochloromethane	47.89	5.0	50	0	95.8	78-122	0			
Dichlorodifluoromethane	51.1	5.0	50	0	102	57-140	0			
Ethylbenzene	48.54	5.0	50	0	97.1	80-122	0			
Isopropylbenzene	49.87	5.0	50	0	99.7	72-127	0			
Methyl acetate	45.32	5.0	50	0	90.6	69-123	0			
Methyl tert-butyl ether	47.18	5.0	50	0	94.4	76-121	0			
Methylcyclohexane	53.78	5.0	50	0	108	77-126	0			
Styrene	50.78	5.0	50	0	102	78-124	0			
Tetrachloroethene	50.61	5.0	50	0	101	80-121	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 51 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: <b>R60280</b>		Instrument ID <b>VOA3</b>		Method: <b>SW8260</b>			
Toluene	48.64	5.0	50	0	97.3	79-120	0
trans-1,2-Dichloroethene	50.59	5.0	50	0	101	79-122	0
trans-1,3-Dichloropropene	49.2	5.0	50	0	98.4	77-120	0
Trichloroethene	48.42	5.0	50	0	96.8	80-121	0
Trichlorofluoromethane	53.31	5.0	50	0	107	75-126	0
Vinyl chloride	53.24	2.0	50	0	106	76-126	0
Xylenes, Total	148.2	15	150	0	98.8	80-120	0
<i>Surr: 1,2-Dichloroethane-d4</i>	46.91	0	50	0	93.8	70-128	0
<i>Surr: 4-Bromofluorobenzene</i>	47.46	0	50	0	94.9	73-126	0
<i>Surr: Dibromofluoromethane</i>	46.64	0	50	0	93.3	71-128	0
<i>Surr: Toluene-d8</i>	46	0	50	0	92	73-127	0

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 52 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **R60280** Instrument ID **VOA3** Method: **SW8260**

MS		Sample ID: <b>0802304-01BMS</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/25/08 15:09</b>		
Client ID:		Run ID: <b>VOA3_080225A</b>				SeqNo: <b>1334673</b>		Prep Date:		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	46.12	5.0	50	0	92.2	79-124	0			
1,1,2,2-Tetrachloroethane	44.29	5.0	50	0	88.6	75-123	0			
1,1,2-Trichlor-1,2,2-trifluoroethane	48.62	5.0	50	0	97.2	79-125	0			
1,1,2-Trichloroethane	45.93	5.0	50	0	91.9	79-120	0			
1,1-Dichloroethane	44.06	5.0	50	0	88.1	75-124	0			
1,1-Dichloroethene	48.08	5.0	50	0	96.2	80-122	0			
1,2,4-Trichlorobenzene	41.4	5.0	50	0	82.8	74-128	0			
1,2-Dibromo-3-chloropropane	46.65	5.0	50	0	93.3	66-129	0			
1,2-Dibromoethane	46.23	5.0	50	0	92.5	79-120	0			
1,2-Dichlorobenzene	41.85	5.0	50	0	83.7	79-120	0			
1,2-Dichloroethane	45.21	5.0	50	0	90.4	73-121	0			
1,2-Dichloropropane	45.05	5.0	50	0	90.1	76-120	0			
1,3-Dichlorobenzene	42.83	5.0	50	0	85.7	79-120	0			
1,4-Dichlorobenzene	42.58	5.0	50	0	85.2	77-120	0			
2-Butanone	91.1	10	100	0	91.1	65-130	0			
2-Hexanone	97.38	10	100	0	97.4	65-133	0			
4-Methyl-2-pentanone	94.47	10	100	0	94.5	69-130	0			
Acetone	103.9	20	100	0	104	53-142	0			
Benzene	45.62	5.0	50	0	91.2	79-120	0			
Bromodichloromethane	45.62	5.0	50	0	91.2	79-121	0			
Bromoform	46.87	5.0	50	0	93.7	74-122	0			
Bromomethane	41.67	10	50	0	83.3	68-131	0			
Carbon disulfide	91.63	10	100	0	91.6	80-124	0			
Carbon tetrachloride	48.57	5.0	50	0	97.1	74-126	0			
Chlorobenzene	44.07	5.0	50	0	88.1	79-120	0			
Chloroethane	47.31	10	50	0	94.6	76-126	0			
Chloroform	44.42	5.0	50	0	88.8	78-120	0			
Chloromethane	42.97	10	50	0	85.9	69-129	0			
cis-1,2-Dichloroethene	44.08	5.0	50	0	88.2	80-120	0			
cis-1,3-Dichloropropene	46.26	5.0	50	0	92.5	77-123	0			
Cyclohexane	48.26	5.0	50	0	96.5	74-126	0			
Dibromochloromethane	45.18	5.0	50	0	90.4	78-122	0			
Dichlorodifluoromethane	48.54	5.0	50	0	97.1	57-140	0			
Ethylbenzene	45.79	5.0	50	0	91.6	80-122	0			
Isopropylbenzene	46.46	5.0	50	0	92.9	72-127	0			
Methyl acetate	41.16	5.0	50	0	82.3	69-123	0			
Methyl tert-butyl ether	43.2	5.0	50	0	86.4	76-121	0			
Methylcyclohexane	46.31	5.0	50	0	92.6	77-126	0			
Styrene	45.68	5.0	50	0	91.4	78-124	0			
Tetrachloroethene	47.64	5.0	50	0	95.3	80-121	0			

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: <b>R60280</b>		Instrument ID <b>VOA3</b>		Method: <b>SW8260</b>			
Toluene	44.63	5.0	50	0	89.3	79-120	0
trans-1,2-Dichloroethene	45.68	5.0	50	0	91.4	79-122	0
trans-1,3-Dichloropropene	45.99	5.0	50	0	92	77-120	0
Trichloroethene	47.82	5.0	50	0	95.6	80-121	0
Trichlorofluoromethane	48.21	5.0	50	0	96.4	75-126	0
Vinyl chloride	49.19	2.0	50	0	98.4	76-126	0
Xylenes, Total	137.4	15	150	0	91.6	80-120	0
<i>Surr: 1,2-Dichloroethane-d4</i>	<i>49.47</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>98.9</i>	<i>70-128</i>	<i>0</i>
<i>Surr: 4-Bromofluorobenzene</i>	<i>51.19</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>102</i>	<i>73-126</i>	<i>0</i>
<i>Surr: Dibromofluoromethane</i>	<i>47.9</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>95.8</i>	<i>71-128</i>	<i>0</i>
<i>Surr: Toluene-d8</i>	<i>49.39</i>	<i>0</i>	<i>50</i>	<i>0</i>	<i>98.8</i>	<i>73-127</i>	<i>0</i>

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 54 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **R60280** Instrument ID **VOA3** Method: **SW8260**

MSD		Sample ID: <b>0802304-01BMSD</b>				Units: <b>µg/Kg</b>		Analysis Date: <b>02/25/08 18:46</b>		
Client ID:		Run ID: <b>VOA3_080225A</b>				SeqNo: <b>1334674</b>		Prep Date:		DF: 1
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
1,1,1-Trichloroethane	53	5.0	50	0	106	79-124	46.12	13.9	30	
1,1,2,2-Tetrachloroethane	51.12	5.0	50	0	102	75-123	44.29	14.3	30	
1,1,2-Trichlor-1,2,2-trifluoroethane	56.09	5.0	50	0	112	79-125	48.62	14.3	30	
1,1,2-Trichloroethane	51.48	5.0	50	0	103	79-120	45.93	11.4	30	
1,1-Dichloroethane	52.34	5.0	50	0	105	75-124	44.06	17.2	30	
1,1-Dichloroethene	56.56	5.0	50	0	113	80-122	48.08	16.2	30	
1,2,4-Trichlorobenzene	46.78	5.0	50	0	93.6	74-128	41.4	12.2	30	
1,2-Dibromo-3-chloropropane	50.09	5.0	50	0	100	66-129	46.65	7.1	30	
1,2-Dibromoethane	50.1	5.0	50	0	100	79-120	46.23	8.04	30	
1,2-Dichlorobenzene	48	5.0	50	0	96	79-120	41.85	13.7	30	
1,2-Dichloroethane	53.18	5.0	50	0	106	73-121	45.21	16.2	30	
1,2-Dichloropropane	53.18	5.0	50	0	106	76-120	45.05	16.5	30	
1,3-Dichlorobenzene	49.42	5.0	50	0	98.8	79-120	42.83	14.3	30	
1,4-Dichlorobenzene	48.61	5.0	50	0	97.2	77-120	42.58	13.2	30	
2-Butanone	99.88	10	100	0	99.9	65-130	91.1	9.19	30	
2-Hexanone	102.5	10	100	0	103	65-133	97.38	5.14	30	
4-Methyl-2-pentanone	99.71	10	100	0	99.7	69-130	94.47	5.39	30	
Acetone	118.7	20	100	0	119	53-142	103.9	13.3	30	
Benzene	53.75	5.0	50	0	108	79-120	45.62	16.4	30	
Bromodichloromethane	52.91	5.0	50	0	106	79-121	45.62	14.8	30	
Bromoform	50.76	5.0	50	0	102	74-122	46.87	7.97	30	
Bromomethane	49.84	10	50	0	99.7	68-131	41.67	17.9	30	
Carbon disulfide	109.9	10	100	0	110	80-124	91.63	18.1	30	
Carbon tetrachloride	55.5	5.0	50	0	111	74-126	48.57	13.3	30	
Chlorobenzene	50.11	5.0	50	0	100	79-120	44.07	12.8	30	
Chloroethane	55.15	10	50	0	110	76-126	47.31	15.3	30	
Chloroform	52.57	5.0	50	0	105	78-120	44.42	16.8	30	
Chloromethane	50.26	10	50	0	101	69-129	42.97	15.6	30	
cis-1,2-Dichloroethene	49.72	5.0	50	0	99.4	80-120	44.08	12	30	
cis-1,3-Dichloropropene	52.89	5.0	50	0	106	77-123	46.26	13.4	30	
Cyclohexane	55.62	5.0	50	0	111	74-126	48.26	14.2	30	
Dibromochloromethane	49.5	5.0	50	0	99	78-122	45.18	9.14	30	
Dichlorodifluoromethane	57.01	5.0	50	0	114	57-140	48.54	16	30	
Ethylbenzene	51.21	5.0	50	0	102	80-122	45.79	11.2	30	
Isopropylbenzene	51.12	5.0	50	0	102	72-127	46.46	9.57	30	
Methyl acetate	45.84	5.0	50	0	91.7	69-123	41.16	10.8	30	
Methyl tert-butyl ether	50.31	5.0	50	0	101	76-121	43.2	15.2	30	
Methylcyclohexane	53.42	5.0	50	0	107	77-126	46.31	14.3	30	
Styrene	51.31	5.0	50	0	103	78-124	45.68	11.6	30	
Tetrachloroethene	53.81	5.0	50	0	108	80-121	47.64	12.2	30	

ND - Not Detected at the Reporting Limit      S - Spike Recovery outside accepted recovery limits      B - Analyte detected in assoc. Method Blank  
J - Analyte detected below quantitation limits      R - RPD outside accepted recovery limits      U - Analyzed for but not detected  
O - Referenced analyte value is > 4 times amount spiked      P - Dual Column results percent difference > 40%      E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: <b>R60280</b>		Instrument ID <b>VOA3</b>		Method: <b>SW8260</b>						
Toluene	51.44	5.0	50	0	103	79-120	44.63	14.2	30	
trans-1,2-Dichloroethene	53.22	5.0	50	0	106	79-122	45.68	15.3	30	
trans-1,3-Dichloropropene	53.13	5.0	50	0	106	77-120	45.99	14.4	30	
Trichloroethene	54.95	5.0	50	0	110	80-121	47.82	13.9	30	
Trichlorofluoromethane	55.76	5.0	50	0	112	75-126	48.21	14.5	30	
Vinyl chloride	56.23	2.0	50	0	112	76-126	49.19	13.4	30	
Xylenes, Total	155.1	15	150	0	103	80-120	137.4	12.2	30	
<i>Surr: 1,2-Dichloroethane-d4</i>	50.62	0	50	0	101	70-128	49.47	2.3	30	
<i>Surr: 4-Bromofluorobenzene</i>	48.93	0	50	0	97.9	73-126	51.19	4.51	30	
<i>Surr: Dibromofluoromethane</i>	49.11	0	50	0	98.2	71-128	47.9	2.5	30	
<i>Surr: Toluene-d8</i>	48.96	0	50	0	97.9	73-127	49.39	0.864	30	

The following samples were analyzed in this batch:

0802300-01B	0802300-02B	0802300-03B
0802300-04B	0802300-05B	0802300-06B
0802300-07B	0802300-08B	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 56 of 60



**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: **R60093** Instrument ID **Balance1** Method: **E160.3**

DUP	Sample ID: 0802318-04CDUP					Units: wt%		Analysis Date: 02/19/08 12:00		
Client ID:	Run ID: BALANCE1_080219B				SeqNo: 1330957	Prep Date:		DF: 1		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Percent Moisture	8.126	0.010	0	0	0	0-0	8.382	3.1	20	

DUP	Sample ID: 0802346-04ADUP					Units: wt%		Analysis Date: 02/19/08 12:00		
Client ID:	Run ID: BALANCE1_080219B				SeqNo: 1330961		Prep Date:		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Percent Moisture	37.21	0.010	0	0	0	0-0	37.56	0.935	20	

The following samples were analyzed in this batch:

0802300-01C	0802300-02C	0802300-03C
0802300-04C	0802300-05C	0802300-06C
0802300-07D	0802300-08C	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 57 of 60

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: **R60110** Instrument ID **UV-2450** Method: **E365.3** **(Dissolve)**

MBLK	Sample ID: WBLKW1-022008				Units: mg/Kg			Analysis Date: 02/20/08 10:00		
Client ID:	Run ID: UV-2450_080220A				SeqNo: 1331161		Prep Date:		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Phosphorus, Dissolved (As P)	U	0.13								
Phosphorus, Total (As P)	U	0.50								
Phosphorus, Total Orthophosphate	U	0.13								

LCS	Sample ID: <b>WLCSW1-022008</b>					Units: <b>mg/Kg</b>		Analysis Date: <b>02/20/08 10:00</b>		
Client ID:	Run ID: <b>UV-2450_080220A</b>				SeqNo: <b>1331162</b>		Prep Date:		DF: 1	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Phosphorus, Total (As P)	13	0.50	12.5	0	104	80-120	0			

MS				Sample ID: 0802300-01CMS			Units: mg/Kg		Analysis Date: 02/20/08 10:00	
Client ID: F14-SB-1 (0-2)				Run ID: UV-2450_080220A			SeqNo: 1331180		Prep Date: DF: 5	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Phosphorus, Total (As P)	114.5	2.5	12.5	88.75	206	80-120	0			SO

DUP	Sample ID: 0802300-01CDUP					Units: mg/Kg		Analysis Date: 02/20/08 10:00		
Client ID: F14-SB-1 (0-2)			Run ID: UV-2450_080220A			SeqNo: 1331179		Prep Date:		DF: 5
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Phosphorus, Dissolved (As P)	U	0.65	0	0	0	0-0	0	0	20	
Phosphorus, Total (As P)	86.75	2.5	0	0	0	0-0	88.75	2.28	20	
Phosphorus, Total Orthophosphate	U	0.65	0	0	0	0-0	0	0	20	

The following samples were analyzed in this batch:

0802300-01C	0802300-02C	0802300-03C
0802300-04C	0802300-05C	0802300-06C
0802300-07D	0802300-08C	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

**CLIENT:** Malcolm Pirnie, Inc.  
**Work Order:** 0802300  
**Project:** Oro Grande LF-Shallow Borings

# QC BATCH REPORT

Batch ID: **R60205** Instrument ID **UV-2450** Method: **SW9014**

<b>MBLK</b>	Sample ID: <b>WBLKW1-022208</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 12:00</b>		
Client ID:	Run ID: <b>UV-2450_080222E</b>				SeqNo: <b>1333091</b>		Prep Date:		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	U	2.0								
Cyanide, Amenable to Chlorination	U	2.0								

<b>LCS</b>	Sample ID: <b>WLCSW1-022208</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 12:00</b>		
Client ID:	Run ID: <b>UV-2450_080222E</b>				SeqNo: <b>1333092</b>		Prep Date:		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	9.7	2.0	10	0	97	80-120	0			

<b>MS</b>	Sample ID: <b>0802304-01CMS</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 12:00</b>		
Client ID:	Run ID: <b>UV-2450_080222E</b>				SeqNo: <b>1333109</b>		Prep Date:		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	9.2	2.0	10	0.1	91	75-125	0			

<b>DUP</b>	Sample ID: <b>0802304-01CDDU</b>				Units: <b>mg/Kg</b>			Analysis Date: <b>02/22/08 12:00</b>		
Client ID:	Run ID: <b>UV-2450_080222E</b>				SeqNo: <b>1333108</b>		Prep Date:		DF: <b>1</b>	
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Cyanide	U	2.0	0	0	0	0-0	0.1	0	20	
Cyanide, Amenable to Chlorination	U	2.0	0	0	0	0-0	0	0	0	

The following samples were analyzed in this batch:

0802300-01C	0802300-02C	0802300-03C
0802300-04C	0802300-05C	0802300-06C
0802300-07D	0802300-08C	

ND - Not Detected at the Reporting Limit	S - Spike Recovery outside accepted recovery limits	B - Analyte detected in assoc. Method Blank
J - Analyte detected below quantitation limits	R - RPD outside accepted recovery limits	U - Analyzed for but not detected
O - Referenced analyte value is > 4 times amount spiked	P - Dual Column results percent difference > 40%	E - Value above quantitation range

QC Page: 59 of 60

CLIENT: Malcolm Pirnie, Inc.  
Work Order: 0802300  
Project: Oro Grande LF-Shallow Borings

## QC BATCH REPORT

Batch ID: **R60293** Instrument ID **UV-2450** Method: **SM4500-SiD**

<b>MBLK</b>	Sample ID: <b>WBLKS1-022608</b>				Units: <b>mg/kg</b>			Analysis Date: <b>02/26/08 11:45</b>		
Client ID:	Run ID: <b>UV-2450_080226C</b>				SeqNo: <b>1334919</b>	Prep Date:		DF: 1		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Silica, Dissolved (as SiO2)	U	0.10								

<b>LCS</b>	Sample ID: <b>WLCSS1-022608</b>				Units: <b>mg/kg</b>			Analysis Date: <b>02/26/08 11:45</b>		
Client ID:	Run ID: <b>UV-2450_080226C</b>				SeqNo: <b>1334920</b>	Prep Date:		DF: 1		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Silica, Dissolved (as SiO2)	5.14	0.10	5	0	103	80-120	0			

<b>MS</b>	Sample ID: <b>0802300-01CMS</b>				Units: <b>mg/kg</b>			Analysis Date: <b>02/26/08 11:45</b>		
Client ID: <b>F14-SB-1 (0-2)</b>	Run ID: <b>UV-2450_080226C</b>				SeqNo: <b>1334942</b>	Prep Date:		DF: 1		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Silica, Dissolved (as SiO2)	20.28	0.10	5	16.31	79.4	80-120	0			SE

<b>DUP</b>	Sample ID: <b>0802300-01CDUP</b>				Units: <b>mg/kg</b>			Analysis Date: <b>02/26/08 11:45</b>		
Client ID: <b>F14-SB-1 (0-2)</b>	Run ID: <b>UV-2450_080226C</b>				SeqNo: <b>1334941</b>	Prep Date:		DF: 1		
Analyte	Result	PQL	SPK Val	SPK Ref Value	%REC	Control Limit	RPD Ref Value	%RPD	RPD Limit	Qual
Silica, Dissolved (as SiO2)	15.98	0.10	0	0	0		16.31	2.04		

The following samples were analyzed in this batch:

0802300-01C	0802300-02D	0802300-03C
0802300-04C	0802300-05D	0802300-06C
0802300-07D	0802300-08D	

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

O - Referenced analyte value is > 4 times amount spiked

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

P - Dual Column results percent difference > 40%

B - Analyte detected in assoc. Method Blank

U - Analyzed for but not detected

E - Value above quantitation range

QC Page: 60 of 60

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_  
 Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300  
 Instrument ID: VOA3 Calibration Date(s): 02/22/08 02/22/08  
 Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1839 2313

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2
		A0	A1	A2	
Dichlorodifluoromethane	AVRG		0.22529496		13.7
Chloromethane	AVRG		0.50395004		6.4
Vinyl Chloride	AVRG		0.38061303		12.8
Bromomethane	AVRG		0.47034754		6.3
Chloroethane	AVRG		0.25590152		13.3
Trichlorofluoromethane	AVRG		0.52093848		11.4
Acetone	2ORDR	-0.1030328	7.69742006	-0.4850961	1.000
1,1-Dichloroethene	AVRG		0.44134287		11.8
Methylene Chloride	2ORDR	-2.67e-002	2.12273658	-8.33e-002	1.000
Carbon Disulfide	AVRG		1.23232143		8.2
trans-1,2-Dichloroethene	AVRG		0.52949026		7.2
1,1-Dichloroethane	AVRG		0.62436785		6.0
2-Butanone	AVRG		0.27355813		4.7
cis-1,2-Dichloroethene	AVRG		0.56688104		6.0
Chloroform	AVRG		0.64832752		4.1
1,1,1-Trichloroethane	AVRG		0.56575531		8.3
1,2-Dichloroethane	AVRG		0.21292786		6.0
Carbon Tetrachloride	AVRG		0.31001095		11.5
Benzene	AVRG		0.98477378		5.4
Trichloroethene	AVRG		0.37385412		9.0
Bromodichloromethane	AVRG		0.30312539		7.3
1,2-Dichloropropane	AVRG		0.21848339		6.6
4-Methyl-2-Pentanone	AVRG		0.41051773		6.9
cis-1,3-Dichloropropene	AVRG		0.35972479		6.2
Toluene	AVRG		1.34768016		5.9
trans-1,3-Dichloropropene	AVRG		0.28056964		5.9
2-Hexanone	AVRG		0.27008591		5.0
1,1,2-Trichloroethane	AVRG		0.21712708		4.3
Dibromochloromethane	AVRG		0.35828242		7.5
Tetrachloroethene	AVRG		0.32100523		10.8
1,2-Dibromoethane	AVRG		0.34318420		6.2
Chlorobenzene	AVRG		1.07891045		6.5
Ethylbenzene	AVRG		0.53165863		8.6
m,p-Xylenes	AVRG		0.67727071		8.0
o-Xylene	AVRG		0.64914349		8.2
Styrene	AVRG		1.13325264		8.9
Bromoform	AVRG		0.25184687		8.7

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802300

Instrument ID: VOA3

Calibration Date(s): 02/22/08 02/22/08

Column: DB624

ID: 0.18 (mm)

Calibration Time(s): 1839 2313

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2
		A0	A1	A2	
Isopropylbenzene	AVRG		1.42085798		9.5
1,1,2,2-Tetrachloroethane	AVRG		0.67886333		4.0
1,3-Dichlorobenzene	AVRG		1.60773650		6.6
1,4-Dichlorobenzene	AVRG		1.63839256		5.9
1,2-Dichlorobenzene	AVRG		1.53650202		5.9
1,2-Dibromo-3-Chloropropane	AVRG		0.14824980		9.3
1,2,4-Trichlorobenzene	AVRG		0.99308149		9.6
Methyl tert-butyl ether	AVRG		1.01876955		4.3
Methylcyclohexane	AVRG		0.71459521		14.9
Cyclohexane	AVRG		0.69216911		14.6
Freon TF	AVRG		0.48314480		13.6
Methyl Acetate	AVRG		0.84402848		6.4
Dibromofluoromethane	AVRG		0.53239644		1.8
1,2-Dichloroethane-d4	AVRG		0.27529825		3.4
Toluene-d8	AVRG		1.25374927		2.1
4-Bromofluorobenzene	AVRG		0.45418738		3.2

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802300

Instrument ID: VOA3

Calibration Date(s): 02/22/08 02/22/08

Column: DB624

ID: 0.18 (mm)

Calibration Time(s): 1839

2313

LAB FILE ID:

RF2.5: G022203

RF5: G022204

RF10: G022205

RF20: G022206

RF50: G022213

COMPOUND	RF2.5	RF5	RF10	RF20	RF50
Dichlorodifluoromethane		0.196	0.190	0.194	0.262
Chloromethane	0.539	0.551	0.477	0.473	0.528
Vinyl Chloride	0.325	0.332	0.332	0.356	0.431
Bromomethane	0.523	0.492	0.441	0.431	0.482
Chloroethane	0.194	0.237	0.230	0.256	0.282
Trichlorofluoromethane	0.458	0.471	0.466	0.470	0.590
Acetone	0.246	0.212	0.167	0.154	0.134
1,1-Dichloroethene	0.401	0.398	0.371	0.404	0.500
Methylene Chloride	0.674	0.592	0.501	0.516	0.514
Carbon Disulfide	1.202	1.158	1.092	1.122	1.318
trans-1,2-Dichloroethene	0.500	0.512	0.472	0.509	0.576
1,1-Dichloroethane	0.635	0.612	0.548	0.606	0.660
2-Butanone	0.293	0.284	0.267	0.281	0.256
cis-1,2-Dichloroethene	0.539	0.570	0.502	0.568	0.584
Chloroform	0.641	0.657	0.594	0.661	0.686
1,1,1-Trichloroethane	0.551	0.560	0.489	0.510	0.616
1,2-Dichloroethane	0.192	0.218	0.196	0.220	0.227
Carbon Tetrachloride	0.289	0.298	0.276	0.262	0.366
Benzene	0.950	0.987	0.894	0.962	1.067
Trichloroethene	0.380	0.354	0.323	0.347	0.432
Bromodichloromethane	0.274	0.295	0.272	0.310	0.330
1,2-Dichloropropane	0.192	0.222	0.205	0.220	0.237
4-Methyl-2-Pentanone	0.435	0.456	0.398	0.430	0.399
cis-1,3-Dichloropropene	0.342	0.351	0.323	0.366	0.391
Toluene	1.419	1.326	1.243	1.287	1.494
trans-1,3-Dichloropropene	0.260	0.277	0.255	0.293	0.302
2-Hexanone	0.252	0.284	0.260	0.283	0.276
1,1,2-Trichloroethane	0.209	0.223	0.208	0.224	0.232
Dibromochloromethane	0.333	0.351	0.319	0.362	0.398
Tetrachloroethene	0.319	0.304	0.288	0.277	0.388
1,2-Dibromoethane	0.328	0.341	0.315	0.357	0.374
Chlorobenzene	1.118	1.053	0.978	1.057	1.210
Ethylbenzene	0.567	0.506	0.473	0.484	0.609
m,p-Xylenes	0.678	0.643	0.613	0.637	0.786
o-Xylene	0.663	0.600	0.588	0.615	0.748
Styrene	1.068	1.032	1.023	1.110	1.322
Bromoform	0.230	0.248	0.230	0.248	0.288

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802300

Instrument ID: VOA3

Calibration Date(s): 02/22/08 02/22/08

Column: DB624

ID: 0.18 (mm)

Calibration Time(s): 1839

2313

LAB FILE ID:

RF2.5: G022203

RF5: G022204

RF10: G022205

RF20: G022206

RF50: G022213

COMPOUND	RF2.5	RF5	RF10	RF20	RF50
Isopropylbenzene	1.432	1.295	1.266	1.303	1.668
1,1,2,2-Tetrachloroethane	0.654	0.713	0.666	0.719	0.689
1,3-Dichlorobenzene	1.653	1.545	1.460	1.558	1.812
1,4-Dichlorobenzene	1.676	1.641	1.486	1.600	1.813
1,2-Dichlorobenzene	1.607	1.504	1.422	1.519	1.704
1,2-Dibromo-3-Chloropropane	0.124	0.143	0.144	0.153	0.161
1,2,4-Trichlorobenzene	0.984	0.923	0.878	0.928	1.152
Methyl tert-butyl ether	0.980	1.074	0.956	1.063	1.032
Methylcyclohexane	0.679	0.592	0.604	0.600	0.831
Cyclohexane	0.638	0.577	0.585	0.599	0.785
Freon TF	0.430	0.422	0.420	0.419	0.556
Methyl Acetate	0.943	0.800	0.838	0.879	0.792
Dibromofluoromethane	0.527	0.533	0.532	0.552	0.538
1,2-Dichloroethane-d4	0.279	0.282	0.279	0.281	0.266
Toluene-d8	1.219	1.251	1.246	1.259	1.302
4-Bromofluorobenzene	0.438	0.444	0.450	0.451	0.474

FORM VI VOA



FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802300

Instrument ID: VOA3

Calibration Date(s): 02/22/08 02/22/08

Column: DB624

ID: 0.18 (mm)

Calibration Time(s): 1839

2313

LAB FILE ID:

RF100: G022208

RF150: G022209

RF200: G022210

COMPOUND	RF100	RF150	RF200
Dichlorodifluoromethane	0.242	0.253	0.240
Chloromethane	0.482	0.512	0.469
Vinyl Chloride	0.425	0.434	0.409
Bromomethane	0.457	0.478	0.458
Chloroethane	0.286	0.295	0.267
Trichlorofluoromethane	0.571	0.585	0.556
Acetone	0.137	0.142	0.141
1,1-Dichloroethene	0.482	0.496	0.477
Methylene Chloride	0.486	0.507	
Carbon Disulfide	1.310	1.361	1.295
trans-1,2-Dichloroethene	0.535	0.581	0.551
1,1-Dichloroethane	0.628	0.670	0.635
2-Butanone	0.257	0.274	0.276
cis-1,2-Dichloroethene	0.575	0.618	0.579
Chloroform	0.644	0.666	0.638
1,1,1-Trichloroethane	0.592	0.613	0.593
1,2-Dichloroethane	0.210	0.221	0.220
Carbon Tetrachloride	0.318	0.325	0.347
Benzene	0.975	1.022	1.022
Trichloroethene	0.371	0.382	0.402
Bromodichloromethane	0.300	0.320	0.324
1,2-Dichloropropane	0.214	0.228	0.229
4-Methyl-2-Pentanone	0.370	0.385	0.409
cis-1,3-Dichloropropene	0.350	0.377	0.377
Toluene	1.299	1.341	1.373
trans-1,3-Dichloropropene	0.276	0.290	0.292
2-Hexanone	0.256	0.264	0.285
1,1,2-Trichloroethane	0.206	0.215	0.222
Dibromochloromethane	0.346	0.369	0.389
Tetrachloroethene	0.320	0.323	0.348
1,2-Dibromoethane	0.322	0.342	0.366
Chlorobenzene	1.026	1.074	1.115
Ethylbenzene	0.517	0.537	0.560
m,p-Xylenes	0.660	0.684	0.716
o-Xylene	0.627	0.661	0.691
Styrene	1.120	1.179	1.212
Bromoform	0.236	0.252	0.282

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802300

Instrument ID: VOA3

Calibration Date(s): 02/22/08 02/22/08

Column: DB624

ID: 0.18 (mm)

Calibration Time(s): 1839 2313

LAB FILE ID:

RF100: G022208

RF150: G022209

RF200: G022210

COMPOUND	RF100	RF150	RF200
Isopropylbenzene	1.418	1.451	1.533
1,1,2,2-Tetrachloroethane	0.640	0.670	0.679
1,3-Dichlorobenzene	1.550	1.616	1.666
1,4-Dichlorobenzene	1.561	1.640	1.691
1,2-Dichlorobenzene	1.450	1.507	1.579
1,2-Dibromo-3-Chloropropane	0.141	0.149	0.170
1,2,4-Trichlorobenzene	0.956	1.013	1.110
Methyl tert-butyl ether	0.979	1.052	1.014
Methylcyclohexane	0.788	0.820	0.803
Cyclohexane	0.778	0.809	0.766
Freon TF	0.530	0.556	0.533
Methyl Acetate	0.806	0.887	0.806
Dibromofluoromethane	0.529	0.529	0.519
1,2-Dichloroethane-d4	0.276	0.282	0.256
Toluene-d8	1.238	1.238	1.277
4-Bromofluorobenzene	0.442	0.456	0.478

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: Contract:  
Lab Code: Case No.: SAS No.: SDG No.: 0802300  
Instrument ID: VOA2 Calibration Date(s): 02/19/08 02/19/08  
Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1043 1333

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2
		A0	A1	A2	
Dichlorodifluoromethane	LINR	-1.14e-002	1.26394884		1.000
Chloromethane	LINR	-6.73e-002	1.72662381		0.994
Vinyl Chloride	AVRG		0.61617669		4.0
Bromomethane	AVRG		0.45378753		9.5
Chloroethane	AVRG		0.35896662		3.5
Trichlorofluoromethane	AVRG		1.31872428		3.9
Acetone	AVRG		0.17534955		10.1
1,1-Dichloroethene	AVRG		0.57061788		4.4
Methylene Chloride	AVRG		0.62468961		10.0
Carbon Disulfide	AVRG		1.56846817		4.7
trans-1,2-Dichloroethene	AVRG		0.63979262		2.7
1,1-Dichloroethane	AVRG		1.16181010		3.3
2-Butanone	AVRG		0.19739956		4.9
cis-1,2-Dichloroethene	AVRG		0.67454991		3.6
Chloroform	AVRG		1.27851438		4.3
1,1,1-Trichloroethane	AVRG		1.16115250		7.5
1,2-Dichloroethane	AVRG		0.86599971		5.4
Carbon Tetrachloride	AVRG		0.88427795		14.2
Benzene	AVRG		1.68974573		3.8
Trichloroethene	AVRG		0.55168985		5.1
Bromodichloromethane	AVRG		0.67897336		7.2
1,2-Dichloropropane	AVRG		0.38743283		3.9
4-Methyl-2-Pentanone	AVRG		0.31689932		5.8
cis-1,3-Dichloropropene	AVRG		0.66816462		9.2
Toluene	AVRG		2.03914609		2.3
trans-1,3-Dichloropropene	AVRG		0.63862269		12.4
2-Hexanone	AVRG		0.21228939		7.6
1,1,2-Trichloroethane	AVRG		0.32247132		6.6
Dibromochloromethane	AVRG		0.53375102		12.4
Tetrachloroethene	AVRG		0.48443397		2.6
1,2-Dibromoethane	AVRG		0.44609722		2.6
Chlorobenzene	AVRG		1.52220947		5.8
Ethylbenzene	AVRG		0.81045562		4.2
m,p-Xylenes	AVRG		0.96801724		2.1
o-Xylene	AVRG		0.94211712		1.5
Styrene	AVRG		1.61779510		2.2
Bromoform	2ORDR	2.694e-002	3.06291181	-0.3223803	1.000

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: Contract:  
 Lab Code: Case No.: SAS No.: SDG No.: 0802300  
 Instrument ID: VOA2 Calibration Date(s): 02/19/08 02/19/08  
 Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1043 1333

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2
		A0	A1	A2	
=====	=====	=====	=====	=====	=====
Isopropylbenzene	AVRG		1.96708612		5.5
1,1,2,2-Tetrachloroethane	AVRG		0.72094158		8.2
1,3-Dichlorobenzene	AVRG		2.17919946		7.3
1,4-Dichlorobenzene	AVRG		2.25585579		8.7
1,2-Dichlorobenzene	AVRG		2.06971932		6.5
1,2-Dibromo-3-Chloropropane	2ORDR	1.535e-002	7.32536170	-2.0442741	1.000
1,2,4-Trichlorobenzene	AVRG		0.82572446		6.2
Methyl tert-butyl ether	AVRG		1.50687929		4.6
Methylcyclohexane	AVRG		0.53479675		9.8
Cyclohexane	AVRG		0.91903410		5.2
Freon TF	AVRG		0.58449924		4.0
Methyl Acetate	AVRG		0.67116681		10.4
=====	=====	=====	=====	=====	=====
Dibromofluoromethane	AVRG		0.57787679		2.7
1,2-Dichloroethane-d4	AVRG		0.81012954		2.5
Toluene-d8	AVRG		1.50909682		5.0
4-Bromofluorobenzene	LINR	5.889e-003	1.52976175		1.000

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: VOA2 Calibration Date(s): 02/19/08 02/19/08

Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1043 1333

LAB FILE ID: RF2.5: D021903 RF5: D021904 RF10: D021905  
RF20: D021906 RF50: D021907

COMPOUND	RF2.5	RF5	RF10	RF20	RF50
Dichlorodifluoromethane	0.848	0.915	0.780	0.791	0.800
Chloromethane	0.678	0.727	0.653	0.658	0.670
Vinyl Chloride	0.624	0.646	0.602	0.598	0.633
Bromomethane	0.512	0.470	0.445	0.462	0.471
Chloroethane	0.370	0.347	0.352	0.349	0.365
Trichlorofluoromethane	1.293	1.389	1.278	1.226	1.316
Acetone	0.212	0.184	0.185	0.157	0.161
1,1-Dichloroethene	0.541	0.616	0.551	0.552	0.574
Methylene Chloride	0.772	0.634	0.608	0.592	0.607
Carbon Disulfide	1.493	1.538	1.497	1.502	1.613
trans-1,2-Dichloroethene	0.656	0.632	0.632	0.614	0.638
1,1-Dichloroethane	1.241	1.190	1.135	1.120	1.148
2-Butanone	0.209	0.182	0.207	0.188	0.196
cis-1,2-Dichloroethene	0.715	0.689	0.659	0.644	0.687
Chloroform	1.398	1.296	1.279	1.223	1.257
1,1,1-Trichloroethane	1.078	1.079	1.078	1.104	1.177
1,2-Dichloroethane	0.976	0.870	0.856	0.821	0.856
Carbon Tetrachloride	1.178	0.893	0.809	0.774	0.824
Benzene	1.762	1.778	1.705	1.638	1.704
Trichloroethene	0.610	0.544	0.529	0.520	0.566
Bromodichloromethane	0.618	0.633	0.638	0.648	0.713
1,2-Dichloropropane	0.398	0.412	0.372	0.376	0.401
4-Methyl-2-Pentanone	0.314	0.287	0.321	0.294	0.320
cis-1,3-Dichloropropene	0.602	0.615	0.606	0.626	0.701
Toluene	2.050	2.058	2.009	1.939	2.038
trans-1,3-Dichloropropene	0.566	0.552	0.584	0.575	0.656
2-Hexanone	0.189	0.193	0.232	0.206	0.206
1,1,2-Trichloroethane	0.367	0.341	0.319	0.305	0.318
Dibromochloromethane	0.461	0.461	0.489	0.497	0.542
Tetrachloroethene	0.481	0.502	0.483	0.458	0.480
1,2-Dibromoethane	0.447	0.425	0.457	0.436	0.438
Chlorobenzene	1.714	1.587	1.477	1.454	1.504
Ethylbenzene	0.796	0.869	0.752	0.792	0.805
m,p-Xylenes	0.996	0.963	0.950	0.938	0.980
o-Xylene	0.949	0.938	0.963	0.930	0.958
Styrene	1.658	1.597	1.598	1.556	1.639
Bromoform	0.271	0.263	0.284	0.283	0.327

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: Contract:  
 Lab Code: Case No.: SAS No.: SDG No.: 0802300  
 Instrument ID: VOA2 Calibration Date(s): 02/19/08 02/19/08  
 Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1043 1333  
 LAB FILE ID: RF2.5: D021903 RF5: D021904 RF10: D021905  
 RF20: D021906 RF50: D021907

COMPOUND	RF2.5	RF5	RF10	RF20	RF50
=====	=====	=====	=====	=====	=====
Isopropylbenzene	1.833	1.868	1.862	1.919	2.025
1,1,2,2-Tetrachloroethane	0.808	0.739	0.802	0.677	0.694
1,3-Dichlorobenzene	2.520	2.294	2.137	2.024	2.123
1,4-Dichlorobenzene	2.662	2.417	2.291	2.139	2.154
1,2-Dichlorobenzene	2.313	2.213	2.117	1.979	2.033
1,2-Dibromo-3-Chloropropane	0.057	0.124	0.148	0.127	0.136
1,2,4-Trichlorobenzene	0.881	0.729	0.826	0.789	0.803
Methyl tert-butyl ether	1.633	1.505	1.488	1.393	1.456
Methylcyclohexane	0.416	0.520	0.536	0.530	0.558
Cyclohexane	0.938	0.995	0.868	0.860	0.880
Freon TF	0.555	0.609	0.579	0.551	0.582
Methyl Acetate	0.796	0.728	0.708	0.571	0.642
=====	=====	=====	=====	=====	=====
Dibromofluoromethane	0.572	0.590	0.564	0.553	0.575
1,2-Dichloroethane-d4	0.830	0.831	0.836	0.785	0.799
Toluene-d8	1.356	1.556	1.469	1.478	1.495
4-Bromofluorobenzene	0.637	0.672	0.668	0.639	0.646
=====	=====	=====	=====	=====	=====

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: VOA2 Calibration Date(s): 02/19/08 02/19/08

Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1043 1333

LAB FILE ID: RF100: D021908 RF150: D021909 RF200: D021910

COMPOUND	RF100	RF150	RF200
Dichlorodifluoromethane	0.820	0.792	0.789
Chloromethane	0.666	0.582	0.572
Vinyl Chloride	0.646	0.602	0.578
Bromomethane	0.486	0.379	0.405
Chloroethane	0.382	0.358	0.348
Trichlorofluoromethane	1.359	1.342	1.348
Acetone	0.167	0.168	0.169
1,1-Dichloroethene	0.588	0.586	0.558
Methylene Chloride	0.616	0.601	0.566
Carbon Disulfide	1.675	1.660	1.569
trans-1,2-Dichloroethene	0.662	0.658	0.625
1,1-Dichloroethane	1.168	1.152	1.140
2-Butanone	0.201	0.203	0.192
cis-1,2-Dichloroethene	0.685	0.673	0.645
Chloroform	1.280	1.267	1.227
1,1,1-Trichloroethane	1.245	1.257	1.271
1,2-Dichloroethane	0.851	0.846	0.851
Carbon Tetrachloride	0.833	0.877	0.887
Benzene	1.694	1.657	1.580
Trichloroethene	0.559	0.550	0.535
Bromodichloromethane	0.726	0.724	0.731
1,2-Dichloropropane	0.391	0.381	0.369
4-Methyl-2-Pentanone	0.328	0.331	0.341
cis-1,3-Dichloropropene	0.735	0.736	0.724
Toluene	2.084	2.059	2.075
trans-1,3-Dichloropropene	0.701	0.724	0.751
2-Hexanone	0.224	0.221	0.228
1,1,2-Trichloroethane	0.314	0.309	0.307
Dibromochloromethane	0.590	0.604	0.625
Tetrachloroethene	0.493	0.487	0.491
1,2-Dibromoethane	0.457	0.450	0.457
Chlorobenzene	1.501	1.474	1.466
Ethylbenzene	0.838	0.819	0.812
m,p-Xylenes	0.993	0.966	0.959
o-Xylene	0.947	0.924	0.928
Styrene	1.666	1.612	1.616
Bromoform	0.352	0.364	0.388

FORM VI VOA

FORM 6  
VOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: VOA2 Calibration Date(s): 02/19/08 02/19/08

Column: DB624 ID: 0.18 (mm) Calibration Time(s): 1043 1333

LAB FILE ID: RF100: D021908 RF150: D021909 RF200: D021910

COMPOUND	RF100	RF150	RF200
=====	=====	=====	=====
Isopropylbenzene	2.089	2.039	2.102
1,1,2,2-Tetrachloroethane	0.717	0.689	0.641
1,3-Dichlorobenzene	2.159	2.129	2.048
1,4-Dichlorobenzene	2.176	2.137	2.071
1,2-Dichlorobenzene	2.019	1.965	1.918
1,2-Dibromo-3-Chloropropane	0.152	0.154	0.168
1,2,4-Trichlorobenzene	0.847	0.851	0.879
Methyl tert-butyl ether	1.522	1.541	1.516
Methylcyclohexane	0.584	0.566	0.569
Cyclohexane	0.957	0.947	0.907
Freon TF	0.610	0.604	0.586
Methyl Acetate	0.652	0.635	0.637
=====	=====	=====	=====
Dibromofluoromethane	0.594	0.599	0.575
1,2-Dichloroethane-d4	0.816	0.797	0.789
Toluene-d8	1.577	1.572	1.570
4-Bromofluorobenzene	0.647	0.646	0.658

FORM VI VOA



FORM 7  
VOLATILE CONTINUING CALIBRATION CHECK

Lab Name: Contract:  
Lab Code: Case No.: SAS No.: SDG No.: 0802300  
Instrument ID: VOA2 Calibration Date: 02/19/08 Time: 1544  
Lab File ID: E021902 Init. Calib. Date(s): 02/19/08 02/19/08  
Heated Purge: (Y/N) N Init. Calib. Times: 1043 1333  
GC Column: DB624 ID: 0.18 (mm)

COMPOUND	SAMPLE AMOUNT	CAL50 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
Dichlorodifluoromethane	47.91	50.00	LINR	4.2	20.0
Chloromethane	52.12	50.00	LINR	4.2	20.0
Vinyl Chloride	47.56	50.00	AVRG	4.9	20.0
Bromomethane	48.78	50.00	AVRG	2.4	20.0
Chloroethane	49.19	50.00	AVRG	1.6	20.0
Trichlorofluoromethane	46.34	50.00	AVRG	7.3	20.0
Acetone	86.48	100.00	AVRG	13.5	20.0
1,1-Dichloroethene	45.17	50.00	AVRG	9.7	20.0
Methylene Chloride	45.30	50.00	AVRG	9.4	20.0
Carbon Disulfide	92.60	100.00	AVRG	7.4	20.0
trans-1,2-Dichloroethene	46.18	50.00	AVRG	7.6	20.0
1,1-Dichloroethane	44.89	50.00	AVRG	10.2	20.0
2-Butanone	95.45	100.00	AVRG	4.6	20.0
cis-1,2-Dichloroethene	47.36	50.00	AVRG	5.3	20.0
Chloroform	46.10	50.00	AVRG	7.8	20.0
1,1,1-Trichloroethane	47.78	50.00	AVRG	4.4	20.0
1,2-Dichloroethane	48.04	50.00	AVRG	3.9	20.0
Carbon Tetrachloride	42.88	50.00	AVRG	14.2	20.0
Benzene	47.72	50.00	AVRG	4.6	20.0
Trichloroethene	47.89	50.00	AVRG	4.2	20.0
Bromodichloromethane	48.70	50.00	AVRG	2.6	20.0
1,2-Dichloropropane	47.07	50.00	AVRG	5.9	20.0
4-Methyl-2-Pentanone	94.80	100.00	AVRG	5.2	20.0
cis-1,3-Dichloropropene	49.84	50.00	AVRG	0.3	20.0
Toluene	48.08	50.00	AVRG	3.8	20.0
trans-1,3-Dichloropropene	50.25	50.00	AVRG	0.5	20.0
2-Hexanone	98.95	100.00	AVRG	1.0	20.0
1,1,2-Trichloroethane	46.40	50.00	AVRG	7.2	20.0
Dibromochloromethane	49.40	50.00	AVRG	1.2	20.0
Tetrachloroethene	46.74	50.00	AVRG	6.5	20.0
1,2-Dibromoethane	47.11	50.00	AVRG	5.8	20.0
Chlorobenzene	46.74	50.00	AVRG	6.5	20.0
Ethylbenzene	47.01	50.00	AVRG	6.0	20.0
m,p-Xylenes	95.75	100.00	AVRG	4.2	20.0
o-Xylene	47.59	50.00	AVRG	4.8	20.0
Styrene	47.91	50.00	AVRG	4.2	20.0
Bromoform	46.18	50.00	2ORDR	7.6	20.0

FORM 7  
VOLATILE CONTINUING CALIBRATION CHECK

Lab Name: Contract:  
 Lab Code: Case No.: SAS No.: SDG No.: 0802300  
 Instrument ID: VOA2 Calibration Date: 02/19/08 Time: 1544  
 Lab File ID: E021902 Init. Calib. Date(s): 02/19/08 02/19/08  
 Heated Purge: (Y/N) N Init. Calib. Times: 1043 1333  
 GC Column: DB624 ID: 0.18 (mm)

COMPOUND	SAMPLE AMOUNT	CAL50 AMOUNT	CURVE	%D	MAX %d
Isopropylbenzene	48.80	50.00	AVRG	2.4	20.0
1,1,2,2-Tetrachloroethane	46.01	50.00	AVRG	8.0	20.0
1,3-Dichlorobenzene	46.88	50.00	AVRG	6.2	20.0
1,4-Dichlorobenzene	44.90	50.00	AVRG	10.2	20.0
1,2-Dichlorobenzene	46.88	50.00	AVRG	6.2	20.0
1,2-Dibromo-3-Chloropropane	50.25	50.00	2ORDR	0.5	20.0
1,2,4-Trichlorobenzene	50.84	50.00	AVRG	1.7	20.0
Methyl tert-butyl ether	47.21	50.00	AVRG	5.6	20.0
Methylcyclohexane	50.56	50.00	AVRG	1.1	20.0
Cyclohexane	44.87	50.00	AVRG	10.3	20.0
Freon TF	46.88	50.00	AVRG	6.2	20.0
Methyl Acetate	40.78	50.00	AVRG	18.4	20.0
Dibromofluoromethane	41.82	50.00	AVRG	16.4	20.0
1,2-Dichloroethane-d4	40.25	50.00	AVRG	19.5	20.0
Toluene-d8	44.59	50.00	AVRG	10.8	20.0
4-Bromofluorobenzene	42.92	50.00	LINR	14.2	20.0

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: Contract:  
Lab Code: Case No.: SAS No.: SDG No.: 0802300  
Instrument ID: SV2 Calibration Date(s): 02/20/08 02/20/08  
Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1135 1351  
LAB FILE ID: RF0.2: 04 RF0.5: 05 RF1: 06  
RF2.5: 03 RF5: 07

COMPOUND	RF0.2	RF0.5	RF1	RF2.5	RF5
Phenol	1.652	1.574	1.588	1.729	1.777
Bis(2-chloroethyl) ether	1.340	1.349	1.340	1.376	1.435
2-Chlorophenol	1.423	1.290	1.440	1.446	1.526
2-Methylphenol	1.460	1.188	1.202	1.351	1.448
bis(2-Chloroisopropyl) ether	0.560	0.456	0.534	0.527	0.509
3&4-Methylphenol	1.604	1.477	1.396	1.531	1.612
N-Nitroso-di-n-propylamine	1.115	0.970	1.052	1.053	1.077
Hexachloroethane	0.790	0.703	0.641	0.655	0.682
Nitrobenzene	0.401	0.358	0.391	0.408	0.384
Isophorone	0.616	0.625	0.677	0.679	0.633
2-Nitrophenol	0.202	0.186	0.187	0.187	0.194
2,4-Dimethylphenol	0.270	0.321	0.326	0.337	0.330
Bis(2-chloroethoxy)methane	0.416	0.454	0.428	0.435	0.451
2,4-Dichlorophenol	0.237	0.257	0.256	0.273	0.268
Naphthalene	1.189	1.109	1.101	1.147	1.118
4-Chloroaniline	0.500	0.414	0.448	0.473	0.457
Hexachlorobutadiene	0.143	0.132	0.138	0.146	0.132
4-Chloro-3-Methylphenol	0.278	0.319	0.331	0.315	0.306
2-Methylnaphthalene	0.503	0.531	0.534	0.565	0.537
Hexachlorocyclopentadiene	0.285	0.262	0.256	0.305	0.300
2,4,6-Trichlorophenol	0.360	0.310	0.294	0.335	0.329
2,4,5-Trichlorophenol	0.302	0.328	0.351	0.368	0.347
2-Chloronaphthalene	1.236	1.086	1.208	1.143	1.081
2-Nitroaniline	0.494	0.391	0.378	0.442	0.445
Dimethylphthalate	1.381	1.286	1.278	1.295	1.309
Acenaphthylene	1.934	1.681	1.761	1.979	1.981
2,6-Dinitrotoluene	0.268	0.294	0.288	0.297	0.288
3-Nitroaniline	0.407	0.316	0.320	0.349	0.352
Acenaphthene	1.081	1.082	1.088	1.140	1.152
2,4-Dinitrophenol	0.106	0.091	0.096	0.123	0.136
Dibenzofuran	1.594	1.527	1.549	1.601	1.620
4-Nitrophenol	0.226	0.170	0.170	0.215	0.200
2,4-Dinitrotoluene	0.295	0.280	0.307	0.370	0.352
Diethylphthalate	1.297	1.189	1.240	1.437	1.364
4-Chlorophenyl phenyl ether	0.537	0.475	0.534	0.566	0.568
Fluorene	1.305	1.226	1.315	1.347	1.336
4-Nitroaniline	0.285	0.305	0.322	0.362	0.376

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: SV2 Calibration Date(s): 02/20/08 02/20/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1135 1351

LAB FILE ID: RF0.2: 04 RF0.5: 05 RF1: 06  
RF2.5: 03 RF5: 07

COMPOUND	RF0.2	RF0.5	RF1	RF2.5	RF5
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	0.114	0.107	0.141	0.189	0.200
N-Nitrosodiphenylamine	1.048	1.160	1.144	1.294	1.256
4-Bromophenyl-phenylether	0.331	0.290	0.327	0.370	0.332
Hexachlorobenzene	0.345	0.342	0.372	0.386	0.363
Pentachlorophenol	0.208	0.184	0.158	0.191	0.183
Phenanthrene	1.229	1.084	1.108	1.223	1.228
Anthracene	1.120	1.092	1.062	1.186	1.157
Carbazole	0.965	0.891	0.990	1.072	1.085
Di-n-butylphthalate	1.512	1.370	1.430	1.612	1.563
Fluoranthene	0.939	1.008	1.043	1.088	1.087
Pyrene	1.470	1.544	1.424	1.570	1.568
Butylbenzylphthalate	0.856	0.855	0.776	1.042	0.938
Benzo(a)Anthracene	1.181	1.170	1.117	1.204	1.206
3,3'-Dichlorobenzidine	0.432	0.424	0.426	0.493	0.470
bis(2-ethylhexyl)phthalate	1.417	1.157	1.119	1.405	1.256
Chrysene	1.032	1.123	1.095	1.250	1.214
Di-n-octylphthalate	1.863	1.603	1.865	2.155	2.004
Benzo(b)fluoranthene	1.090	0.930	1.086	1.299	1.078
Benzo(k)fluoranthene	1.040	1.214	1.193	1.147	1.330
Benzo(a)pyrene	1.028	0.900	1.091	1.100	1.054
Indeno(1,2,3-cd)pyrene	1.066	0.801	0.871	0.941	1.009
Dibenzo(a,h)anthracene	0.890	0.952	0.947	1.025	1.044
Benzo(g,h,i)perylene	1.117	0.957	1.126	1.123	1.086
Acetophenone	0.537	0.505	0.533	0.504	0.504
Caprolactam	0.134	0.110	0.117	0.121	0.110
1,1'-Biphenyl	1.542	1.427	1.426	1.528	1.566
Benzaldehyde	1.205	1.011	1.080	1.143	1.186
Atrazine	0.322	0.275	0.292	0.377	0.364
=====	=====	=====	=====	=====	=====
Phenol-d6	1.893	1.865	1.742	1.749	1.853
2-Fluorophenol	1.370	1.112	1.207	1.365	1.472
Nitrobenzene-d5	0.374	0.360	0.405	0.420	0.395
2-Fluorobiphenyl	1.308	1.239	1.278	1.373	1.380
2,4,6-Tribromophenol	0.184	0.178	0.170	0.183	0.188
4-Terphenyl-d14	0.868	0.861	0.856	0.942	0.944

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: Contract:  
Lab Code: Case No.: SAS No.: SDG No.: 0802300  
Instrument ID: SV2 Calibration Date(s): 02/20/08 02/20/08  
Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1135 1351  
LAB FILE ID: RF7.5: 08 RF10: 09

COMPOUND	RF7.5	RF10
=====	=====	=====
Phenol	1.799	1.737
Bis(2-chloroethyl) ether	1.425	1.332
2-Chlorophenol	1.512	1.525
2-Methylphenol	1.405	1.365
bis(2-Chloroisopropyl) ether	0.488	0.484
3&4-Methylphenol	1.576	1.524
N-Nitroso-di-n-propylamine	1.074	1.045
Hexachloroethane	0.676	0.650
Nitrobenzene	0.364	0.377
Isophorone	0.631	0.636
2-Nitrophenol	0.174	0.174
2,4-Dimethylphenol	0.315	0.290
Bis(2-chloroethoxy) methane	0.424	0.433
2,4-Dichlorophenol	0.255	0.253
Naphthalene	1.072	1.079
4-Chloroaniline	0.448	0.440
Hexachlorobutadiene	0.124	0.125
4-Chloro-3-Methylphenol	0.289	0.296
2-Methylnaphthalene	0.529	0.525
Hexachlorocyclopentadiene	0.298	0.293
2,4,6-Trichlorophenol	0.320	0.321
2,4,5-Trichlorophenol	0.345	0.357
2-Chloronaphthalene	1.020	1.072
2-Nitroaniline	0.426	0.430
Dimethylphthalate	1.234	1.227
Acenaphthylene	1.886	1.890
2,6-Dinitrotoluene	0.274	0.288
3-Nitroaniline	0.341	0.334
Acenaphthene	1.084	1.065
2,4-Dinitrophenol	0.133	0.133
Dibenzofuran	1.532	1.532
4-Nitrophenol	0.193	0.191
2,4-Dinitrotoluene	0.359	0.348
Diethylphthalate	1.309	1.306
4-Chlorophenyl phenyl ether	0.527	0.527
Fluorene	1.309	1.293
4-Nitroaniline	0.354	0.346

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: SV2 Calibration Date(s): 02/20/08 02/20/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1135 1351

LAB FILE ID: RF7.5: 08 RF10: 09

COMPOUND	RF7.5	RF10
=====	=====	=====
4,6-Dinitro-2-methylphenol	0.190	0.189
N-Nitrosodiphenylamine	1.116	1.137
4-Bromophenyl-phenylether	0.308	0.302
Hexachlorobenzene	0.339	0.334
Pentachlorophenol	0.174	0.167
Phenanthrene	1.121	1.108
Anthracene	1.100	1.081
Carbazole	1.005	1.015
Di-n-butylphthalate	1.407	1.386
Fluoranthene	1.005	0.985
Pyrene	1.423	1.500
Butylbenzylphthalate	0.857	0.888
Benzo(a)Anthracene	1.151	1.199
3,3'-Dichlorobenzidine	0.438	0.447
bis(2-ethylhexyl)phthalate	1.181	1.228
Chrysene	1.118	1.173
Di-n-octylphthalate	2.046	2.085
Benzo(b)fluoranthene	1.124	1.157
Benzo(k)fluoranthene	1.283	1.234
Benzo(a)pyrene	1.084	1.118
Indeno(1,2,3-cd)pyrene	0.992	0.998
Dibenzo(a,h)anthracene	1.062	1.097
Benzo(g,h,i)perylene	1.107	1.165
Acetophenone	0.485	0.483
Caprolactam	0.108	0.107
1,1'-Biphenyl	1.462	1.468
Benzaldehyde	1.052	1.105
Atrazine	0.324	0.319
=====	=====	=====
Phenol-d6	1.856	1.761
2-Fluorophenol	1.373	1.404
Nitrobenzene-d5	0.390	0.396
2-Fluorobiphenyl	1.306	1.313
2,4,6-Tribromophenol	0.174	0.173
4-Terphenyl-d14	0.867	0.893

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_  
 Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300  
 Instrument ID: SV2 Calibration Date(s): 02/20/08 02/20/08  
 Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1135 1351

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2
		A0	A1	A2	
Phenol	AVRG		1.69365432		5.3
Bis(2-chloroethyl) ether	AVRG		1.37104966		3.1
2-Chlorophenol	AVRG		1.45185534		5.7
2-Methylphenol	AVRG		1.34561998		8.2
bis(2-Chloroisopropyl) ether	AVRG		0.50839282		6.9
3&4-Methylphenol	AVRG		1.53134491		5.0
N-Nitroso-di-n-propylamine	AVRG		1.05518586		4.2
Hexachloroethane	AVRG		0.68548361		7.4
Nitrobenzene	AVRG		0.38329736		4.8
Isophorone	AVRG		0.64263643		3.9
2-Nitrophenol	AVRG		0.18651897		5.5
2,4-Dimethylphenol	AVRG		0.31271045		7.7
Bis(2-chloroethoxy) methane	AVRG		0.43454102		3.2
2,4-Dichlorophenol	AVRG		0.25704444		4.5
Naphthalene	AVRG		1.11661751		3.6
4-Chloroaniline	AVRG		0.45436463		5.9
Hexachlorobutadiene	AVRG		0.13414957		6.2
4-Chloro-3-Methylphenol	AVRG		0.30512885		6.0
2-Methylnaphthalene	AVRG		0.53211028		3.4
Hexachlorocyclopentadiene	AVRG		0.28554409		6.6
2,4,6-Trichlorophenol	AVRG		0.32420516		6.4
2,4,5-Trichlorophenol	AVRG		0.34266895		6.3
2-Chloronaphthalene	AVRG		1.12077577		7.0
2-Nitroaniline	AVRG		0.42966948		8.9
Dimethylphthalate	AVRG		1.28717893		4.0
Acenaphthylene	AVRG		1.87329474		6.0
2,6-Dinitrotoluene	AVRG		0.28528810		3.7
3-Nitroaniline	AVRG		0.34561963		8.8
Acenaphthene	AVRG		1.09888361		3.0
2,4-Dinitrophenol	AVRG		0.11699946		16.0
Dibenzofuran	AVRG		1.56529776		2.5
4-Nitrophenol	2ORDR	3.908e-002	4.56753626	0.68364379	0.999
2,4-Dinitrotoluene	AVRG		0.33021511		10.7
Diethylphthalate	AVRG		1.30599035		6.1
4-Chlorophenyl phenyl ether	AVRG		0.53352417		5.8
Fluorene	AVRG		1.30459070		3.0
4-Nitroaniline	AVRG		0.33577620		9.7

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_  
 Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300  
 Instrument ID: SV2 Calibration Date(s): 02/20/08 02/20/08  
 Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1135 1351

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2
		A0	A1	A2	
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	2ORDR	0.11528262	4.54375460	0.67985371	0.999
N-Nitrosodiphenylamine	AVRG		1.16491656		7.2
4-Bromophenyl-phenylether	AVRG		0.32285930		8.1
Hexachlorobenzene	AVRG		0.35460265		5.4
Pentachlorophenol	AVRG		0.18061091		9.1
Phenanthrene	AVRG		1.15749002		5.7
Anthracene	AVRG		1.11424493		3.9
Carbazole	AVRG		1.00356816		6.5
Di-n-butylphthalate	AVRG		1.46857176		6.4
Fluoranthene	AVRG		1.02212787		5.3
Pyrene	AVRG		1.49985099		4.2
Butylbenzylphthalate	AVRG		0.88741660		9.4
Benzo (a) Anthracene	AVRG		1.17552661		2.8
3,3'-Dichlorobenzidine	AVRG		0.44727398		5.7
bis(2-ethylhexyl)phthalate	AVRG		1.25200171		9.4
Chrysene	AVRG		1.14359912		6.5
Di-n-octylphthalate	AVRG		1.94574662		9.6
Benzo (b) fluoranthene	AVRG		1.10900978		9.9
Benzo (k) fluoranthene	AVRG		1.20593039		7.8
Benzo (a) pyrene	AVRG		1.05366489		7.0
Indeno (1,2,3-cd) pyrene	AVRG		0.95400084		9.5
Dibenzo (a,h) anthracene	AVRG		1.00259551		7.4
Benzo (g,h,i) perylene	AVRG		1.09723415		6.0
Acetophenone	AVRG		0.50722221		4.1
Caprolactam	AVRG		0.11531953		8.6
1,1'-Biphenyl	AVRG		1.48854866		3.8
Benzaldehyde	AVRG		1.11203689		6.4
Atrazine	AVRG		0.32467732		11.1
=====	=====	=====	=====	=====	=====
Phenol-d6	AVRG		1.81717201		3.5
2-Fluorophenol	AVRG		1.32905354		9.4
Nitrobenzene-d5	AVRG		0.39158298		5.1
2-Fluorobiphenyl	AVRG		1.31399271		3.8
2,4,6-Tribromophenol	AVRG		0.17863058		3.6
4-Terphenyl-d14	AVRG		0.89000176		4.3

FORM VI SV



FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: Contract:  
Lab Code: Case No.: SAS No.: SDG No.: 0802300  
Instrument ID: SV2 Calibration Date(s): 02/21/08 02/21/08  
Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1027 1304  
LAB FILE ID: RF0.2: 04 RF0.5: 05 RF1: 06  
RF2.5: 02 RF5: 07

COMPOUND	RF0.2	RF0.5	RF1	RF2.5	RF5
Phenol	2.102	1.954	2.031	2.013	2.104
Bis(2-chloroethyl) ether	1.551	1.504	1.564	1.543	1.614
2-Chlorophenol	1.574	1.569	1.486	1.498	1.546
2-Methylphenol	1.451	1.433	1.458	1.465	1.482
bis(2-Chloroisopropyl) ether	0.610	0.482	0.533	0.503	0.557
3&4-Methylphenol	1.696	1.660	1.726	1.722	1.771
N-Nitroso-di-n-propylamine	1.623	1.438	1.398	1.382	1.431
Hexachloroethane	0.657	0.758	0.757	0.732	0.764
Nitrobenzene	0.465	0.434	0.454	0.443	0.469
Isophorone	0.748	0.698	0.745	0.756	0.786
2-Nitrophenol	0.157	0.162	0.166	0.174	0.181
2,4-Dimethylphenol	0.315	0.301	0.326	0.334	0.350
Bis(2-chloroethoxy)methane	0.500	0.470	0.467	0.487	0.505
2,4-Dichlorophenol	0.215	0.222	0.240	0.238	0.242
Naphthalene	0.993	1.064	1.068	1.094	1.136
4-Chloroaniline	0.439	0.433	0.419	0.444	0.464
Hexachlorobutadiene	0.108	0.112	0.117	0.112	0.122
4-Chloro-3-Methylphenol	0.336	0.330	0.321	0.326	0.337
2-Methylnaphthalene	0.497	0.525	0.500	0.531	0.553
Hexachlorocyclopentadiene	0.252	0.271	0.273	0.284	0.292
2,4,6-Trichlorophenol	0.346	0.311	0.318	0.337	0.350
2,4,5-Trichlorophenol	0.296	0.332	0.335	0.364	0.380
2-Chloronaphthalene	1.118	1.042	1.115	1.207	1.132
2-Nitroaniline	0.468	0.483	0.558	0.566	0.601
Dimethylphthalate	1.310	1.244	1.272	1.281	1.335
Acenaphthylene	1.922	1.888	1.932	2.028	2.092
2,6-Dinitrotoluene	0.274	0.258	0.283	0.294	0.303
3-Nitroaniline	0.372	0.374	0.372	0.378	0.395
Acenaphthene	1.161	1.122	1.139	1.133	1.210
2,4-Dinitrophenol	0.091	0.098	0.112	0.125	0.139
Dibenzofuran	1.578	1.508	1.549	1.561	1.631
4-Nitrophenol	0.146	0.212	0.218	0.250	0.253
2,4-Dinitrotoluene	0.381	0.321	0.310	0.381	0.401
Diethylphthalate	1.488	1.348	1.416	1.429	1.517
4-Chlorophenyl phenyl ether	0.551	0.488	0.535	0.508	0.539
Fluorene	1.276	1.321	1.300	1.327	1.415
4-Nitroaniline	0.364	0.322	0.350	0.387	0.409

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: Contract:  
Lab Code: Case No.: SAS No.: SDG No.: 0802300  
Instrument ID: SV2 Calibration Date(s): 02/21/08 02/21/08  
Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1027 1304  
LAB FILE ID: RF0.2: 04 RF0.5: 05 RF1: 06  
RF2.5: 02 RF5: 07

COMPOUND	RF0.2	RF0.5	RF1	RF2.5	RF5
4,6-Dinitro-2-methylphenol	0.114	0.117	0.120	0.138	0.160
N-Nitrosodiphenylamine	1.014	0.931	0.963	0.966	1.019
4-Bromophenyl-phenylether	0.227	0.214	0.231	0.233	0.258
Hexachlorobenzene	0.277	0.248	0.254	0.262	0.268
Pentachlorophenol	0.134	0.120	0.123	0.146	0.146
Phenanthrene	1.179	1.092	1.150	1.247	1.250
Anthracene	1.056	1.046	1.087	1.135	1.209
Carbazole	1.010	0.980	1.010	1.026	1.136
Di-n-butylphthalate	1.454	1.336	1.417	1.485	1.566
Fluoranthene	0.926	0.910	0.945	0.969	1.079
Pyrene	1.523	1.491	1.637	1.638	1.651
Butylbenzylphthalate	0.954	0.917	0.935	0.962	0.977
Benzo(a)Anthracene	1.324	1.191	1.220	1.294	1.298
3,3'-Dichlorobenzidine	0.510	0.459	0.485	0.487	0.512
bis(2-ethylhexyl)phthalate	1.721	1.320	1.378	1.386	1.365
Chrysene	1.277	1.135	1.175	1.208	1.230
Di-n-octylphthalate	2.156	2.138	2.088	2.284	2.259
Benzo(b)fluoranthene	1.135	1.128	1.053	1.159	1.163
Benzo(k)fluoranthene	1.176	1.042	1.202	1.219	1.273
Benzo(a)pyrene	1.060	1.052	1.078	1.155	1.102
Indeno(1,2,3-cd)pyrene	1.059	1.022	1.037	1.026	1.087
Dibenzo(a,h)anthracene	1.091	1.011	0.988	1.030	1.064
Benzo(g,h,i)perylene	1.153	1.060	1.108	1.100	1.087
Acetophenone	0.491	0.491	0.528	0.517	0.555
Caprolactam	0.103	0.108	0.114	0.119	0.127
1,1'-Biphenyl	1.499	1.500	1.540	1.512	1.605
Benzaldehyde	1.294	1.372	1.373	1.386	1.422
Atrazine	0.273	0.245	0.272	0.289	0.292
Phenol-d6	2.109	1.976	1.988	2.057	2.108
2-Fluorophenol	1.433	1.319	1.328	1.352	1.399
Nitrobenzene-d5	0.490	0.459	0.477	0.445	0.500
2-Fluorobiphenyl	1.282	1.248	1.294	1.299	1.368
2,4,6-Tribromophenol	0.123	0.136	0.132	0.151	0.157
4-Terphenyl-d14	0.905	0.781	0.917	0.886	0.944

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: Contract:  
Lab Code: Case No.: SAS No.: SDG No.: 0802300  
Instrument ID: SV2 Calibration Date(s): 02/21/08 02/21/08  
Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1027 1304  
LAB FILE ID: RF7.5: 08 RF10: 09

COMPOUND	RF7.5	RF10	CURVE	COEFFICIENT A1	%RSD OR R^2
Phenol	2.031	2.055	AVRG	2.04151462	2.6
Bis(2-chloroethyl) ether	1.541	1.603	AVRG	1.56006712	2.4
2-Chlorophenol	1.518	1.528	AVRG	1.53143896	2.2
2-Methylphenol	1.431	1.519	AVRG	1.46269403	2.1
bis(2-Chloroisopropyl) ether	0.519	0.520	AVRG	0.53198972	7.8
3&4-Methylphenol	1.732	1.729	AVRG	1.71933322	2.0
N-Nitroso-di-n-propylamine	1.353	1.379	AVRG	1.42920357	6.3
Hexachloroethane	0.751	0.735	AVRG	0.73633014	5.0
Nitrobenzene	0.450	0.448	AVRG	0.45189923	2.7
Isophorone	0.783	0.750	AVRG	0.75239795	3.9
2-Nitrophenol	0.174	0.179	AVRG	0.17028983	5.2
2,4-Dimethylphenol	0.344	0.334	AVRG	0.32923171	5.1
Bis(2-chloroethoxy)methane	0.505	0.485	AVRG	0.48842577	3.2
2,4-Dichlorophenol	0.241	0.240	AVRG	0.23397414	4.6
Naphthalene	1.103	1.074	AVRG	1.07606306	4.1
4-Chloroaniline	0.442	0.439	AVRG	0.44016440	3.1
Hexachlorobutadiene	0.117	0.111	AVRG	0.11410328	4.1
4-Chloro-3-Methylphenol	0.327	0.329	AVRG	0.32945539	1.7
2-Methylnaphthalene	0.529	0.519	AVRG	0.52204397	3.7
Hexachlorocyclopentadiene	0.283	0.286	AVRG	0.27737763	4.8
2,4,6-Trichlorophenol	0.320	0.370	AVRG	0.33616256	6.3
2,4,5-Trichlorophenol	0.337	0.343	AVRG	0.34090480	7.8
2-Chloronaphthalene	1.086	1.226	AVRG	1.13244208	5.7
2-Nitroaniline	0.562	0.591	AVRG	0.54704708	9.4
Dimethylphthalate	1.172	1.143	AVRG	1.25107785	5.6
Acenaphthylene	1.975	2.002	AVRG	1.97723717	3.5
2,6-Dinitrotoluene	0.300	0.304	AVRG	0.28802259	5.9
3-Nitroaniline	0.375	0.387	AVRG	0.37923197	2.3
Acenaphthene	1.136	1.154	AVRG	1.15080942	2.5
2,4-Dinitrophenol	0.148	0.153	AVRG	0.12366819	19.7
Dibenzofuran	1.562	1.569	AVRG	1.56531331	2.4
4-Nitrophenol	0.237	0.248	AVRG	0.22363685	16.8
2,4-Dinitrotoluene	0.388	0.389	AVRG	0.36733394	9.8
Diethylphthalate	1.412	1.362	AVRG	1.42479396	4.3
4-Chlorophenyl phenyl ether	0.513	0.521	AVRG	0.52215621	4.1
Fluorene	1.328	1.345	AVRG	1.33030617	3.3
4-Nitroaniline	0.389	0.417	AVRG	0.37699467	8.9

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_  
 Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300  
 Instrument ID: SV2 Calibration Date(s): 02/21/08 02/21/08  
 Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1027 1304  
 LAB FILE ID: RF7.5: 08 RF10: 09

COMPOUND	RF7.5	RF10	CURVE	COEFFICIENT A1	%RSD OR R^2
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	0.166	0.172	AVRG	0.14120648	17.6
N-Nitrosodiphenylamine	0.956	0.916	AVRG	0.96653515	4.0
4-Bromophenyl-phenylether	0.239	0.239	AVRG	0.23452449	5.6
Hexachlorobenzene	0.244	0.252	AVRG	0.25797937	4.5
Pentachlorophenol	0.140	0.142	AVRG	0.13600494	7.9
Phenanthrene	1.219	1.247	AVRG	1.19763704	5.0
Anthracene	1.158	1.119	AVRG	1.11574628	5.2
Carbazole	1.030	1.030	AVRG	1.03179925	4.8
Di-n-butylphthalate	1.487	1.467	AVRG	1.45902268	4.8
Fluoranthene	1.002	1.018	AVRG	0.97828581	6.0
Pyrene	1.540	1.634	AVRG	1.58779022	4.2
Butylbenzylphthalate	0.933	0.962	AVRG	0.94843957	2.2
Benzo(a)Anthracene	1.259	1.357	AVRG	1.27756432	4.6
3,3'-Dichlorobenzidine	0.470	0.516	AVRG	0.49114015	4.5
bis(2-ethylhexyl)phthalate	1.306	1.345	AVRG	1.40286279	10.2
Chrysene	1.138	1.199	AVRG	1.19475326	4.2
Di-n-octylphthalate	2.172	2.360	AVRG	2.20800231	4.3
Benzo(b)fluoranthene	1.249	1.352	AVRG	1.17694160	8.2
Benzo(k)fluoranthene	1.089	1.221	AVRG	1.17448042	6.9
Benzo(a)pyrene	1.075	1.167	AVRG	1.09854858	4.2
Indeno(1,2,3-cd)pyrene	1.034	1.120	AVRG	1.05515135	3.5
Dibenzo(a,h)anthracene	1.004	1.095	AVRG	1.04034869	4.1
Benzo(g,h,i)perylene	1.056	1.152	AVRG	1.10220494	3.6
Acetophenone	0.513	0.516	AVRG	0.51603419	4.3
Caprolactam	0.125	0.106	AVRG	0.11464004	8.4
1,1'-Biphenyl	1.509	1.462	AVRG	1.51835980	2.9
Benzaldehyde	1.375	1.369	AVRG	1.37018648	2.8
Atrazine	0.276	0.272	AVRG	0.27421832	5.6
=====	=====	=====	=====	=====	=====
Phenol-d6	2.009	1.997	AVRG	2.03491737	2.8
2-Fluorophenol	1.403	1.431	AVRG	1.38053979	3.4
Nitrobenzene-d5	0.456	0.456	AVRG	0.46905779	4.3
2-Fluorobiphenyl	1.287	1.317	AVRG	1.29948123	2.8
2,4,6-Tribromophenol	0.146	0.144	AVRG	0.14125239	8.2
4-Terphenyl-d14	0.908	0.950	AVRG	0.89874637	6.3

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: SV4 Calibration Date(s): 02/18/08 02/18/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1456 1707

LAB FILE ID: RF0.2: 04 RF0.5: 05 RF1: 06  
RF2.5: 07 RF5: 08

COMPOUND	RF0.2	RF0.5	RF1	RF2.5	RF5
Phenol	1.358	1.374	1.643	1.828	1.689
Bis(2-chloroethyl)ether	1.100	1.631	1.262	1.632	1.469
2-Chlorophenol	1.103	1.102	1.253	1.394	1.436
2-Methylphenol	1.539	1.022	1.138	1.404	1.316
bis(2-Chloroisopropyl)ether	0.946	0.546	0.604	0.737	0.735
3&4-Methylphenol	1.295	1.345	1.391	1.505	1.569
N-Nitroso-di-n-propylamine	1.310	0.803	0.919	0.993	1.032
Hexachloroethane	0.612	0.548	0.552	0.636	0.596
Nitrobenzene	0.343	0.374	0.376	0.383	0.367
Isophorone	0.780	0.575	0.618	0.575	0.580
2-Nitrophenol	0.253	0.186	0.215	0.209	0.207
2,4-Dimethylphenol	0.250	0.309	0.309	0.328	0.349
Bis(2-chloroethoxy)methane	0.518	0.368	0.393	0.404	0.399
2,4-Dichlorophenol	0.253	0.309	0.276	0.288	0.271
Naphthalene	1.121	0.987	1.033	1.052	0.962
4-Chloroaniline	0.452	0.454	0.423	0.462	0.444
Hexachlorobutadiene	0.130	0.137	0.140	0.157	0.158
4-Chloro-3-Methylphenol	0.291	0.263	0.273	0.298	0.300
2-Methylnaphthalene	0.610	0.528	0.572	0.576	0.553
Hexachlorocyclopentadiene	0.420	0.354	0.407	0.390	0.364
2,4,6-Trichlorophenol	0.348	0.389	0.441	0.392	0.395
2,4,5-Trichlorophenol	0.366	0.333	0.410	0.477	0.388
2-Chloronaphthalene	1.174	1.018	1.119	1.273	1.120
2-Nitroaniline	0.363	0.392	0.379	0.381	0.388
Dimethylphthalate	1.244	1.436	1.492	1.412	1.280
Acenaphthylene	2.084	2.247	2.194	2.087	1.800
2,6-Dinitrotoluene	0.328	0.254	0.371	0.393	0.337
3-Nitroaniline	0.467	0.409	0.430	0.401	0.410
Acenaphthene	1.095	1.210	1.236	1.257	1.123
2,4-Dinitrophenol	0.195	0.170	0.206	0.241	0.234
Dibenzofuran	1.785	1.644	1.693	1.709	1.519
4-Nitrophenol	0.233	0.128	0.214	0.215	0.207
2,4-Dinitrotoluene	0.414	0.402	0.502	0.490	0.423
Diethylphthalate	1.707	1.447	1.572	1.570	1.360
4-Chlorophenyl phenyl ether	0.559	0.594	0.564	0.613	0.626
Fluorene	1.431	1.446	1.442	1.457	1.336
4-Nitroaniline	0.447	0.349	0.326	0.449	0.394

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: SV4 Calibration Date(s): 02/18/08 02/18/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1456 1707

LAB FILE ID: RF0.2: 04 RF0.5: 05 RF1: 06

RF2.5: 07 RF5: 08

COMPOUND	RF0.2	RF0.5	RF1	RF2.5	RF5
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	0.292	0.158	0.201	0.218	0.214
N-Nitrosodiphenylamine	1.043	0.964	0.894	0.970	0.895
4-Bromophenyl-phenylether	0.370	0.197	0.266	0.306	0.285
Hexachlorobenzene	0.355	0.298	0.301	0.315	0.330
Pentachlorophenol	0.170	0.137	0.171	0.194	0.196
Phenanthrene	1.362	1.212	1.134	1.160	1.021
Anthracene	1.337	1.157	1.157	1.207	1.024
Carbazole	1.203	0.937	1.045	1.131	0.972
Di-n-butylphthalate	1.667	1.340	1.393	1.559	1.333
Fluoranthene	1.200	0.962	1.021	1.101	0.984
Pyrene	1.340	1.466	1.226	1.340	1.270
Butylbenzylphthalate	0.722	0.815	0.777	0.805	0.810
Benzo(a)Anthracene	1.148	1.143	1.063	1.237	1.172
3,3'-Dichlorobenzidine	0.463	0.495	0.400	0.506	0.478
bis(2-ethylhexyl)phthalate	1.184	1.239	1.006	1.096	1.155
Chrysene	1.060	1.130	1.198	1.195	1.152
Di-n-octylphthalate	1.796	1.721	1.782	1.900	1.832
Benzo(b)fluoranthene	1.031	0.992	1.167	1.242	1.142
Benzo(k)fluoranthene	1.086	1.251	1.162	1.254	1.197
Benzo(a)pyrene	1.058	0.948	1.071	1.116	1.056
Indeno(1,2,3-cd)pyrene	0.929	0.902	0.937	1.049	1.005
Dibenzo(a,h)anthracene	0.881	0.972	0.972	1.110	1.049
Benzo(g,h,i)perylene	0.989	1.035	1.037	1.163	1.092
Acetophenone	0.465	0.485	0.477	0.472	0.487
Caprolactam	0.119	0.132	0.124	0.132	0.123
1,1'-Biphenyl	1.480	1.515	1.700	1.612	1.460
Benzaldehyde	1.174	0.902	0.927	1.051	1.090
Atrazine	0.260	0.256	0.306	0.301	0.284
=====	=====	=====	=====	=====	=====
Phenol-d6	1.333	1.477	1.456	1.737	1.799
2-Fluorophenol	1.344	1.098	1.114	1.115	1.334
Nitrobenzene-d5	0.384	0.350	0.397	0.353	0.383
2-Fluorobiphenyl	1.320	1.335	1.536	1.490	1.313
2,4,6-Tribromophenol	0.237	0.167	0.217	0.211	0.194
4-Terphenyl-d14	0.856	0.766	0.759	0.899	0.892

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: Contract:  
 Lab Code: Case No.: SAS No.: SDG No.: 0802300  
 Instrument ID: SV4 Calibration Date(s): 02/18/08 02/18/08  
 Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1456 1707  
 LAB FILE ID: RF7.5: 09 RF10: 10

COMPOUND	RF7.5	RF10	CURVE	COEFFICIENT A1	%RSD OR R^2
=====	=====	=====	=====	=====	=====
Phenol	1.477	1.496	AVRG	1.55237249	11.2
Bis (2-chloroethyl) ether	1.490	1.467	AVRG	1.43577916	13.5
2-Chlorophenol	1.299	1.258	AVRG	1.26349376	10.2
2-Methylphenol	1.230	1.261	AVRG	1.27276875	13.3
bis (2-Chloroisopropyl) ether	0.663	0.664	AVRG	0.69920313	18.4
3&4-Methylphenol	1.420	1.441	AVRG	1.42378532	6.5
N-Nitroso-di-n-propylamine	0.873	0.908	AVRG	0.97702089	16.9
Hexachloroethane	0.535	0.590	AVRG	0.58130953	6.4
Nitrobenzene	0.366	0.342	AVRG	0.36439188	4.4
Isophorone	0.555	0.527	AVRG	0.60137266	13.8
2-Nitrophenol	0.192	0.198	AVRG	0.20840540	10.6
2,4-Dimethylphenol	0.333	0.300	AVRG	0.31135015	10.3
Bis (2-chloroethoxy) methane	0.378	0.359	AVRG	0.40268100	13.2
2,4-Dichlorophenol	0.262	0.247	AVRG	0.27241001	7.9
Naphthalene	0.934	0.802	AVRG	0.98456767	10.3
4-Chloroaniline	0.430	0.398	AVRG	0.43750279	5.0
Hexachlorobutadiene	0.150	0.137	AVRG	0.14414966	7.6
4-Chloro-3-Methylphenol	0.292	0.276	AVRG	0.28473151	4.9
2-Methylnaphthalene	0.538	0.485	AVRG	0.55184946	7.2
Hexachlorocyclopentadiene	0.361	0.348	AVRG	0.37783877	7.4
2,4,6-Trichlorophenol	0.336	0.346	AVRG	0.37841589	9.8
2,4,5-Trichlorophenol	0.381	0.374	AVRG	0.38989390	11.5
2-Chloronaphthalene	1.027	0.975	AVRG	1.10095914	9.4
2-Nitroaniline	0.348	0.337	AVRG	0.36989139	5.6
Dimethylphthalate	1.228	1.105	AVRG	1.31374176	10.4
Acenaphthylene	1.713	1.514	AVRG	1.94842423	14.1
2,6-Dinitrotoluene	0.329	0.321	AVRG	0.33345904	13.1
3-Nitroaniline	0.351	0.373	AVRG	0.40604530	9.3
Acenaphthene	1.055	0.978	AVRG	1.13641941	9.0
2,4-Dinitrophenol	0.220	0.238	AVRG	0.21504048	12.1
Dibenzofuran	1.429	1.301	AVRG	1.58285406	10.9
4-Nitrophenol	0.190	0.196	AVRG	0.19763210	17.1
2,4-Dinitrotoluene	0.433	0.396	AVRG	0.43739851	9.6
Diethylphthalate	1.262	1.172	AVRG	1.44137385	13.2
4-Chlorophenyl phenyl ether	0.552	0.539	AVRG	0.57827942	5.7
Fluorene	1.252	1.166	AVRG	1.36140900	8.4
4-Nitroaniline	0.375	0.371	AVRG	0.38749355	12.1

FORM VI SV

FORM 6  
SEMIVOLATILE INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: SV4 Calibration Date(s): 02/18/08 02/18/08

Column: RTX-5SIL MS ID: 0.28 (mm) Calibration Time(s): 1456 1707

LAB FILE ID: RF7.5: 09 RF10: 10

COMPOUND	RF7.5	RF10	CURVE	COEFFICIENT A1	%RSD OR R^2
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	0.217	0.205	AVRG	0.21499811	18.4
N-Nitrosodiphenylamine	0.868	0.779	AVRG	0.91594993	9.3
4-Bromophenyl-phenylether	0.284	0.251	AVRG	0.27981927	19.0
Hexachlorobenzene	0.305	0.283	AVRG	0.31252239	7.6
Pentachlorophenol	0.189	0.178	AVRG	0.17641698	11.5
Phenanthrene	1.016	0.886	AVRG	1.11288714	13.9
Anthracene	1.036	0.868	AVRG	1.11228630	13.6
Carbazole	0.956	0.833	AVRG	1.01112107	12.4
Di-n-butylphthalate	1.336	1.088	AVRG	1.38808587	13.3
Fluoranthene	1.021	0.868	AVRG	1.02234608	10.3
Pyrene	1.238	1.084	AVRG	1.28073938	9.3
Butylbenzylphthalate	0.766	0.742	AVRG	0.77666486	4.6
Benzo(a)Anthracene	1.133	1.060	AVRG	1.13655748	5.4
3,3'-Dichlorobenzidine	0.482	0.446	AVRG	0.46697209	7.6
bis(2-ethylhexyl)phthalate	1.066	1.011	AVRG	1.10814417	8.0
Chrysene	1.113	0.977	AVRG	1.11794146	7.0
Di-n-octylphthalate	1.712	1.721	AVRG	1.78058429	3.9
Benzo(b)fluoranthene	1.059	1.143	AVRG	1.11095640	7.8
Benzo(k)fluoranthene	1.179	1.125	AVRG	1.17899987	5.2
Benzo(a)pyrene	1.000	1.030	AVRG	1.03991573	5.2
Indeno(1,2,3-cd)pyrene	0.982	1.018	AVRG	0.97460842	5.5
Dibenzo(a,h)anthracene	0.996	1.064	AVRG	1.00622547	7.5
Benzo(g,h,i)perylene	1.002	1.068	AVRG	1.05510709	5.6
Acetophenone	0.447	0.425	AVRG	0.46543254	4.8
Caprolactam	0.122	0.122	AVRG	0.12481386	4.2
1,1'-Biphenyl	1.346	1.233	AVRG	1.47791741	10.6
Benzaldehyde	0.894	0.947	AVRG	0.99779091	10.8
Atrazine	0.268	0.266	AVRG	0.27738086	7.2
=====	=====	=====	=====	=====	=====
Phenol-d6	1.554	1.571	AVRG	1.56135306	10.4
2-Fluorophenol	1.135	1.097	AVRG	1.17676838	9.5
Nitrobenzene-d5	0.358	0.339	AVRG	0.36624628	5.9
2-Fluorobiphenyl	1.220	1.126	AVRG	1.33424549	10.7
2,4,6-Tribromophenol	0.190	0.191	AVRG	0.20091324	11.3
4-Terphenyl-d14	0.861	0.815	AVRG	0.83562888	6.8

FORM VI SV



FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: Contract:  
Lab Code: Case No.: SAS No.: SDG No.: 0802300  
Instrument ID: SV2 Calibration Date: 02/20/08 Time: 1442  
Lab File ID: 02 Init. Calib. Date(s): 02/20/08 02/20/08  
Init. Calib. Times: 1135 1351  
GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	SAMPLE AMOUNT	CAL2.5 AMOUNT	CURVE	%D	MAX %d
Phenol	2.57	2.50	AVRG	2.8	20.0
Bis(2-chloroethyl) ether	2.42	2.50	AVRG	3.2	20.0
2-Chlorophenol	2.48	2.50	AVRG	0.8	20.0
2-Methylphenol	2.39	2.50	AVRG	4.4	20.0
bis(2-Chloroisopropyl) ether	2.33	2.50	AVRG	6.8	20.0
3&4-Methylphenol	2.52	2.50	AVRG	0.8	20.0
N-Nitroso-di-n-propylamine	2.39	2.50	AVRG	4.4	20.0
Hexachloroethane	2.28	2.50	AVRG	8.8	20.0
Nitrobenzene	2.38	2.50	AVRG	4.8	20.0
Isophorone	2.42	2.50	AVRG	3.2	20.0
2-Nitrophenol	2.20	2.50	AVRG	12.0	20.0
2,4-Dimethylphenol	2.56	2.50	AVRG	2.4	20.0
Bis(2-chloroethoxy) methane	2.52	2.50	AVRG	0.8	20.0
2,4-Dichlorophenol	2.56	2.50	AVRG	2.4	20.0
Naphthalene	2.42	2.50	AVRG	3.2	20.0
4-Chloroaniline	2.44	2.50	AVRG	2.4	20.0
Hexachlorobutadiene	2.35	2.50	AVRG	6.0	20.0
4-Chloro-3-Methylphenol	2.39	2.50	AVRG	4.4	20.0
2-Methylnaphthalene	2.38	2.50	AVRG	4.8	20.0
Hexachlorocyclopentadiene	2.75	2.50	AVRG	10.0	20.0
2,4,6-Trichlorophenol	2.49	2.50	AVRG	0.4	20.0
2,4,5-Trichlorophenol	2.57	2.50	AVRG	2.8	20.0
2-Chloronaphthalene	2.67	2.50	AVRG	6.8	20.0
2-Nitroaniline	2.45	2.50	AVRG	2.0	20.0
Dimethylphthalate	2.39	2.50	AVRG	4.4	20.0
Acenaphthylene	2.57	2.50	AVRG	2.8	20.0
2,6-Dinitrotoluene	2.37	2.50	AVRG	5.2	20.0
3-Nitroaniline	2.56	2.50	AVRG	2.4	20.0
Acenaphthene	2.51	2.50	AVRG	0.4	20.0
2,4-Dinitrophenol	2.29	2.50	AVRG	8.4	20.0
Dibenzofuran	2.47	2.50	AVRG	1.2	20.0
4-Nitrophenol	2.22	2.50	2ORDR	11.2	20.0
2,4-Dinitrotoluene	2.58	2.50	AVRG	3.2	20.0
Diethylphthalate	2.55	2.50	AVRG	2.0	20.0
4-Chlorophenyl phenyl ether	2.60	2.50	AVRG	4.0	20.0
Fluorene	2.50	2.50	AVRG	0.0	20.0
4-Nitroaniline	2.45	2.50	AVRG	2.0	20.0

FORM VII SV

FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: SV2 Calibration Date: 02/20/08 Time: 1442

Lab File ID: 02 Init. Calib. Date(s): 02/20/08 02/20/08

Init. Calib. Times: 1135 1351

GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	SAMPLE AMOUNT	CAL2.5 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	2.13	2.50	2ORDR	14.8	20.0
N-Nitrosodiphenylamine	2.50	2.50	AVRG	0.0	20.0
4-Bromophenyl-phenylether	2.45	2.50	AVRG	2.0	20.0
Hexachlorobenzene	2.44	2.50	AVRG	2.4	20.0
Pentachlorophenol	2.56	2.50	AVRG	2.4	20.0
Phenanthrene	2.58	2.50	AVRG	3.2	20.0
Anthracene	2.49	2.50	AVRG	0.4	20.0
Carbazole	2.56	2.50	AVRG	2.4	20.0
Di-n-butylphthalate	2.45	2.50	AVRG	2.0	20.0
Fluoranthene	2.56	2.50	AVRG	2.4	20.0
Pyrene	2.70	2.50	AVRG	8.0	20.0
Butylbenzylphthalate	2.62	2.50	AVRG	4.8	20.0
Benzo (a) Anthracene	2.64	2.50	AVRG	5.6	20.0
3,3'-Dichlorobenzidine	2.74	2.50	AVRG	9.6	20.0
bis(2-ethylhexyl)phthalate	2.54	2.50	AVRG	1.6	20.0
Chrysene	2.75	2.50	AVRG	10.0	20.0
Di-n-octylphthalate	2.47	2.50	AVRG	1.2	20.0
Benzo (b) fluoranthene	2.51	2.50	AVRG	0.4	20.0
Benzo (k) fluoranthene	2.52	2.50	AVRG	0.8	20.0
Benzo (a) pyrene	2.58	2.50	AVRG	3.2	20.0
Indeno (1,2,3-cd) pyrene	2.42	2.50	AVRG	3.2	20.0
Dibenzo (a,h) anthracene	2.36	2.50	AVRG	5.6	20.0
Benzo (g,h,i) perylene	2.56	2.50	AVRG	2.4	20.0
Acetophenone	2.29	2.50	AVRG	8.4	20.0
Caprolactam	2.21	2.50	AVRG	11.6	20.0
1,1'-Biphenyl	2.49	2.50	AVRG	0.4	20.0
Benzaldehyde	2.59	2.50	AVRG	3.6	20.0
Atrazine	2.56	2.50	AVRG	2.4	20.0
=====	=====	=====	=====	=====	=====
Phenol-d6	2.51	2.50	AVRG	0.4	20.0
2-Fluorophenol	2.53	2.50	AVRG	1.2	20.0
Nitrobenzene-d5	2.41	2.50	AVRG	3.6	20.0
2-Fluorobiphenyl	2.43	2.50	AVRG	2.8	20.0
2,4,6-Tribromophenol	2.64	2.50	AVRG	5.6	20.0
4-Terphenyl-d14	2.56	2.50	AVRG	2.4	20.0

FORM VII SV

FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: SV2 Calibration Date: 02/25/08 Time: 0756

Lab File ID: 02 Init. Calib. Date(s): 02/21/08 02/21/08

Init. Calib. Times: 1027 1304

GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	RRF	RRF2.5	MIN RRF	%D	MAX %D
Phenol	2.041	2.021	0.8	1.0	20.0
Bis(2-chloroethyl) ether	1.560	1.571	0.7	0.7	20.0
2-Chlorophenol	1.531	1.581	0.8	3.3	20.0
2-Methylphenol	1.463	1.518	0.7	3.8	20.0
bis(2-Chloroisopropyl) ether	0.532	0.530	0.01	0.4	20.0
3&4-Methylphenol	1.719	1.761	0.6	2.4	20.0
N-Nitroso-di-n-propylamine	1.429	1.379	0.5	3.5	20.0
Hexachloroethane	0.736	0.753	0.3	2.3	20.0
Nitrobenzene	0.452	0.429	0.2	5.1	20.0
Isophorone	0.752	0.710	0.4	5.6	20.0
2-Nitrophenol	0.170	0.179	0.1	5.3	20.0
2,4-Dimethylphenol	0.329	0.343	0.2	4.2	20.0
Bis(2-chloroethoxy) methane	0.488	0.477	0.3	2.2	20.0
2,4-Dichlorophenol	0.234	0.258	0.2	10.2	20.0
Naphthalene	1.076	1.082	0.7	0.6	20.0
4-Chloroaniline	0.440	0.443	0.01	0.7	20.0
Hexachlorobutadiene	0.114	0.116	0.01	1.8	20.0
4-Chloro-3-Methylphenol	0.329	0.321	0.2	2.4	20.0
2-Methylnaphthalene	0.522	0.519	0.4	0.6	20.0
Hexachlorocyclopentadiene	0.277	0.280	0.05	1.1	20.0
2,4,6-Trichlorophenol	0.336	0.326	0.2	3.0	20.0
2,4,5-Trichlorophenol	0.341	0.346	0.2	1.5	20.0
2-Chloronaphthalene	1.132	1.297	0.8	14.6	20.0
2-Nitroaniline	0.547	0.546	0.01	0.2	20.0
Dimethylphthalate	1.251	1.271	0.01	1.6	20.0
Acenaphthylene	1.977	1.976	0.9	0.0	20.0
2,6-Dinitrotoluene	0.288	0.291	0.2	1.0	20.0
3-Nitroaniline	0.379	0.357	0.01	5.8	20.0
Acenaphthene	1.151	1.139	0.9	1.0	20.0
2,4-Dinitrophenol	0.124	0.134	0.01	8.1	20.0
Dibenzofuran	1.565	1.544	0.8	1.3	20.0
4-Nitrophenol	0.223	0.241	0.01	8.1	20.0
2,4-Dinitrotoluene	0.367	0.365	0.2	0.5	20.0
Diethylphthalate	1.424	1.393	0.01	2.2	20.0
4-Chlorophenyl phenyl ether	0.522	0.502	0.4	3.8	20.0
Fluorene	1.330	1.312	0.9	1.4	20.0
4-Nitroaniline	0.377	0.392	0.01	4.0	20.0

FORM VII SV

FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: SV2 Calibration Date: 02/25/08 Time: 0756

Lab File ID: 02 Init. Calib. Date(s): 02/21/08 02/21/08

Init. Calib. Times: 1027 1304

GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	RRF	RRF2.5	MIN RRF	%D	MAX %D
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	0.141	0.150	0.01	6.4	20.0
N-Nitrosodiphenylamine	0.966	0.916	0.01	5.2	20.0
4-Bromophenyl-phenylether	0.234	0.209	0.01	10.7	20.0
Hexachlorobenzene	0.258	0.239	0.1	7.4	20.0
Pentachlorophenol	0.136	0.138	0.05	1.5	20.0
Phenanthrene	1.198	1.165	0.7	2.8	20.0
Anthracene	1.116	1.128	0.7	1.1	20.0
Carbazole	1.032	0.946	0.01	8.3	20.0
Di-n-butylphthalate	1.459	1.308	0.01	10.3	20.0
Fluoranthene	0.978	0.881	0.6	9.9	20.0
Pyrene	1.588	1.630	0.6	2.6	20.0
Butylbenzylphthalate	0.948	0.913	0.01	3.7	20.0
Benzo(a)Anthracene	1.278	1.278	0.8	0.0	20.0
3,3'-Dichlorobenzidine	0.491	0.495	0.01	0.8	20.0
bis(2-ethylhexyl)phthalate	1.403	1.316	0.01	6.2	20.0
Chrysene	1.194	1.219	0.7	2.1	20.0
Di-n-octylphthalate	2.208	2.128	0.01	3.6	20.0
Benzo(b)fluoranthene	1.177	1.148	0.7	2.5	20.0
Benzo(k)fluoranthene	1.174	1.176	0.7	0.2	20.0
Benzo(a)pyrene	1.098	1.104	0.7	0.5	20.0
Indeno(1,2,3-cd)pyrene	1.055	1.089	0.5	3.2	20.0
Dibenzo(a,h)anthracene	1.040	1.040	0.4	0.0	20.0
Benzo(g,h,i)perylene	1.102	1.080	0.5	2.0	20.0
Acetophenone	0.516	0.516	0.01	0.0	20.0
Caprolactam	0.114	0.116	0.01	1.8	20.0
1,1'-Biphenyl	1.518	1.530	0.01	0.8	20.0
Benzaldehyde	1.370	1.365	0.01	0.4	20.0
Atrazine	0.274	0.249	0.01	9.1	20.0
=====	=====	=====	=====	=====	=====
Phenol-d6	2.035	2.060	0.01	1.2	20.0
2-Fluorophenol	1.381	1.364	0.01	1.2	20.0
Nitrobenzene-d5	0.469	0.431	0.01	8.1	20.0
2-Fluorobiphenyl	1.299	1.287	0.01	0.9	20.0
2,4,6-Tribromophenol	0.141	0.143	0.01	1.4	20.0
4-Terphenyl-d14	0.899	0.886	0.01	1.4	20.0

FORM VII SV

FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: SV4 Calibration Date: 02/20/08 Time: 1548

Lab File ID: 02 Init. Calib. Date(s): 02/18/08 02/18/08

Init. Calib. Times: 1456 1707

GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	RRF	RRF2.5	MIN RRF	%D	MAX %D
Phenol	1.552	1.513	0.8	2.5	20.0
Bis(2-chloroethyl)ether	1.436	1.196	0.7	16.7	20.0
2-Chlorophenol	1.264	1.199	0.8	5.1	20.0
2-Methylphenol	1.273	1.265	0.7	0.6	20.0
bis(2-Chloroisopropyl)ether	0.699	0.675	0.01	3.4	20.0
3&4-Methylphenol	1.424	1.292	0.6	9.3	20.0
N-Nitroso-di-n-propylamine	0.977	0.870	0.5	11.0	20.0
Hexachloroethane	0.581	0.535	0.3	7.9	20.0
Nitrobenzene	0.364	0.350	0.2	3.8	20.0
Isophorone	0.601	0.544	0.4	9.5	20.0
2-Nitrophenol	0.208	0.190	0.1	8.6	20.0
2,4-Dimethylphenol	0.311	0.320	0.2	2.9	20.0
Bis(2-chloroethoxy)methane	0.403	0.380	0.3	5.7	20.0
2,4-Dichlorophenol	0.272	0.256	0.2	5.9	20.0
Naphthalene	0.984	0.963	0.7	2.1	20.0
4-Chloroaniline	0.438	0.418	0.01	4.6	20.0
Hexachlorobutadiene	0.144	0.162	0.01	12.5	20.0
4-Chloro-3-Methylphenol	0.285	0.280	0.2	1.8	20.0
2-Methylnaphthalene	0.552	0.520	0.4	5.8	20.0
Hexachlorocyclopentadiene	0.378	0.401	0.05	6.1	20.0
2,4,6-Trichlorophenol	0.378	0.362	0.2	4.2	20.0
2,4,5-Trichlorophenol	0.390	0.415	0.2	6.4	20.0
2-Chloronaphthalene	1.101	1.205	0.8	9.4	20.0
2-Nitroaniline	0.370	0.333	0.01	10.0	20.0
Dimethylphthalate	1.314	1.289	0.01	1.9	20.0
Acenaphthylene	1.948	1.823	0.9	6.4	20.0
2,6-Dinitrotoluene	0.333	0.329	0.2	1.2	20.0
3-Nitroaniline	0.406	0.397	0.01	2.2	20.0
Acenaphthene	1.136	1.107	0.9	2.6	20.0
2,4-Dinitrophenol	0.215	0.199	0.01	7.4	20.0
Dibenzofuran	1.583	1.555	0.8	1.8	20.0
4-Nitrophenol	0.198	0.178	0.01	10.1	20.0
2,4-Dinitrotoluene	0.437	0.389	0.2	11.0	20.0
Diethylphthalate	1.441	1.326	0.01	8.0	20.0
4-Chlorophenyl phenyl ether	0.578	0.590	0.4	2.1	20.0
Fluorene	1.361	1.277	0.9	6.2	20.0
4-Nitroaniline	0.387	0.390	0.01	0.8	20.0

FORM VII SV

FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: SV4 Calibration Date: 02/20/08 Time: 1548

Lab File ID: 02 Init. Calib. Date(s): 02/18/08 02/18/08

Init. Calib. Times: 1456 1707

GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	RRF	RRF2.5	MIN RRF	%D	MAX %D
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	0.215	0.194	0.01	9.8	20.0
N-Nitrosodiphenylamine	0.916	0.880	0.01	3.9	20.0
4-Bromophenyl-phenylether	0.280	0.280	0.01	0.0	20.0
Hexachlorobenzene	0.312	0.273	0.1	12.5	20.0
Pentachlorophenol	0.176	0.174	0.05	1.1	20.0
Phenanthrene	1.113	1.142	0.7	2.6	20.0
Anthracene	1.112	1.109	0.7	0.3	20.0
Carbazole	1.011	0.995	0.01	1.6	20.0
Di-n-butylphthalate	1.388	1.349	0.01	2.8	20.0
Fluoranthene	1.022	1.055	0.6	3.2	20.0
Pyrene	1.280	1.305	0.6	2.0	20.0
Butylbenzylphthalate	0.777	0.742	0.01	4.5	20.0
Benzo(a)Anthracene	1.136	1.166	0.8	2.6	20.0
3,3'-Dichlorobenzidine	0.467	0.492	0.01	5.4	20.0
bis(2-ethylhexyl)phthalate	1.108	1.055	0.01	4.8	20.0
Chrysene	1.118	1.145	0.7	2.4	20.0
Di-n-octylphthalate	1.780	1.663	0.01	6.6	20.0
Benzo(b)fluoranthene	1.111	1.102	0.7	0.8	20.0
Benzo(k)fluoranthene	1.179	1.222	0.7	3.6	20.0
Benzo(a)pyrene	1.040	1.064	0.7	2.3	20.0
Indeno(1,2,3-cd)pyrene	0.974	0.979	0.5	0.5	20.0
Dibenzo(a,h)anthracene	1.006	1.030	0.4	2.4	20.0
Benzo(g,h,i)perylene	1.055	0.988	0.5	6.4	20.0
Acetophenone	0.465	0.457	0.01	1.7	20.0
Caprolactam	0.125	0.115	0.01	8.0	20.0
1,1'-Biphenyl	1.478	1.398	0.01	5.4	20.0
Benzaldehyde	0.998	0.993	0.01	0.5	20.0
Atrazine	0.277	0.276	0.01	0.4	20.0
=====	=====	=====	=====	=====	=====
Phenol-d6	1.561	1.489	0.01	4.6	20.0
2-Fluorophenol	1.177	1.135	0.01	3.6	20.0
Nitrobenzene-d5	0.366	0.313	0.01	14.5	20.0
2-Fluorobiphenyl	1.334	1.325	0.01	0.7	20.0
2,4,6-Tribromophenol	0.201	0.206	0.01	2.5	20.0
4-Terphenyl-d14	0.835	0.916	0.01	9.7	20.0

FORM VII SV

FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: SV4 Calibration Date: 02/21/08 Time: 1300

Lab File ID: 03 Init. Calib. Date(s): 02/18/08 02/18/08

Init. Calib. Times: 1456 1707

GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	RRF	RRF2.5	MIN RRF	%D	MAX %D
Phenol	1.552	1.584	0.8	2.1	20.0
Bis(2-chloroethyl) ether	1.436	1.378	0.7	4.0	20.0
2-Chlorophenol	1.264	1.374	0.8	8.7	20.0
2-Methylphenol	1.273	1.232	0.7	3.2	20.0
bis(2-Chloroisopropyl) ether	0.699	0.665	0.01	4.9	20.0
3&4-Methylphenol	1.424	1.477	0.6	3.7	20.0
N-Nitroso-di-n-propylamine	0.977	0.952	0.5	2.6	20.0
Hexachloroethane	0.581	0.530	0.3	8.8	20.0
Nitrobenzene	0.364	0.348	0.2	4.4	20.0
Isophorone	0.601	0.576	0.4	4.2	20.0
2-Nitrophenol	0.208	0.191	0.1	8.2	20.0
2,4-Dimethylphenol	0.311	0.278	0.2	10.6	20.0
Bis(2-chloroethoxy) methane	0.403	0.403	0.3	0.0	20.0
2,4-Dichlorophenol	0.272	0.259	0.2	4.8	20.0
Naphthalene	0.984	0.971	0.7	1.3	20.0
4-Chloroaniline	0.438	0.429	0.01	2.0	20.0
Hexachlorobutadiene	0.144	0.149	0.01	3.5	20.0
4-Chloro-3-Methylphenol	0.285	0.328	0.2	15.1	20.0
2-Methylnaphthalene	0.552	0.541	0.4	2.0	20.0
Hexachlorocyclopentadiene	0.378	0.373	0.05	1.3	20.0
2,4,6-Trichlorophenol	0.378	0.372	0.2	1.6	20.0
2,4,5-Trichlorophenol	0.390	0.412	0.2	5.6	20.0
2-Chloronaphthalene	1.101	1.184	0.8	7.5	20.0
2-Nitroaniline	0.370	0.370	0.01	0.0	20.0
Dimethylphthalate	1.314	1.323	0.01	0.7	20.0
Acenaphthylene	1.948	1.876	0.9	3.7	20.0
2,6-Dinitrotoluene	0.333	0.362	0.2	8.7	20.0
3-Nitroaniline	0.406	0.390	0.01	3.9	20.0
Acenaphthene	1.136	1.158	0.9	1.9	20.0
2,4-Dinitrophenol	0.215	0.221	0.01	2.8	20.0
Dibenzofuran	1.583	1.622	0.8	2.5	20.0
4-Nitrophenol	0.198	0.200	0.01	1.0	20.0
2,4-Dinitrotoluene	0.437	0.449	0.2	2.7	20.0
Diethylphthalate	1.441	1.360	0.01	5.6	20.0
4-Chlorophenyl phenyl ether	0.578	0.622	0.4	7.6	20.0
Fluorene	1.361	1.416	0.9	4.0	20.0
4-Nitroaniline	0.387	0.438	0.01	13.2	20.0

FORM VII SV

FORM 7  
SEMIVOLATILE CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: SV4 Calibration Date: 02/21/08 Time: 1300

Lab File ID: 03 Init. Calib. Date(s): 02/18/08 02/18/08

Init. Calib. Times: 1456 1707

GC Column: RTX-5SIL MS ID: 0.28 (mm)

COMPOUND	RRF	RRF2.5	MIN RRF	%D	MAX %D
=====	=====	=====	=====	=====	=====
4,6-Dinitro-2-methylphenol	0.215	0.212	0.01	1.4	20.0
N-Nitrosodiphenylamine	0.916	0.903	0.01	1.4	20.0
4-Bromophenyl-phenylether	0.280	0.280	0.01	0.0	20.0
Hexachlorobenzene	0.312	0.266	0.1	14.7	20.0
Pentachlorophenol	0.176	0.167	0.05	5.1	20.0
Phenanthrene	1.113	1.126	0.7	1.2	20.0
Anthracene	1.112	1.152	0.7	3.6	20.0
Carbazole	1.011	1.015	0.01	0.4	20.0
Di-n-butylphthalate	1.388	1.404	0.01	1.2	20.0
Fluoranthene	1.022	1.053	0.6	3.0	20.0
Pyrene	1.280	1.359	0.6	6.2	20.0
Butylbenzylphthalate	0.777	0.808	0.01	4.0	20.0
Benzo (a) Anthracene	1.136	1.202	0.8	5.8	20.0
3,3'-Dichlorobenzidine	0.467	0.486	0.01	4.1	20.0
bis(2-ethylhexyl)phthalate	1.108	1.154	0.01	4.2	20.0
Chrysene	1.118	1.090	0.7	2.5	20.0
Di-n-octylphthalate	1.780	2.023	0.01	13.6	20.0
Benzo (b) fluoranthene	1.111	1.292	0.7	16.3	20.0
Benzo (k) fluoranthene	1.179	1.152	0.7	2.3	20.0
Benzo (a) pyrene	1.040	1.188	0.7	14.2	20.0
Indeno (1,2,3-cd) pyrene	0.974	0.973	0.5	0.1	20.0
Dibenzo (a,h) anthracene	1.006	1.058	0.4	5.2	20.0
Benzo (g,h,i) perylene	1.055	0.959	0.5	9.1	20.0
Acetophenone	0.465	0.477	0.01	2.6	20.0
Caprolactam	0.125	0.132	0.01	5.6	20.0
1,1'-Biphenyl	1.478	1.515	0.01	2.5	20.0
Benzaldehyde	0.998	1.004	0.01	0.6	20.0
Atrazine	0.277	0.278	0.01	0.4	20.0
=====	=====	=====	=====	=====	=====
Phenol-d6	1.561	1.598	0.01	2.4	20.0
2-Fluorophenol	1.177	1.347	0.01	14.4	20.0
Nitrobenzene-d5	0.366	0.354	0.01	3.3	20.0
2-Fluorobiphenyl	1.334	1.359	0.01	1.9	20.0
2,4,6-Tribromophenol	0.201	0.189	0.01	6.0	20.0
4-Terphenyl-d14	0.835	0.916	0.01	9.7	20.0

FORM VII SV



FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53

(mm)

Calibration Time(s): 1519

1810

LAB FILE ID:

RF0.005: 006

RF0.01: 007

RF0.02: 008

RF0.04: 009

RF0.06: 010

RF0.08: 011

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
=====	=====	=====	=====	=====	=====	=====
alpha-BHC	4703	9952	20806	49102	76316	112985
gamma-BHC	4917	10317	21430	49512	75715	110507
Heptachlor	1337400.0	1355800.0	1326400.0	1403625.0	1369433.3	1452975.0
Endosulfan I	315400.00	320900.00	310700.00	319900.00	309400.00	322887.50
Dieldrin	1055000.0	1090600.0	1090375.0	1183612.5	1173325.0	1253556.3
Endrin	797400.00	797850.00	802650.00	867850.00	849391.67	916862.50
4,4'-DDD	738000.00	767900.00	801300.00	889762.50	889050.00	961175.00
4,4'-DDT	946100.00	991500.00	1004225.0	1085512.5	1072158.3	1147662.5
Methoxychlor	639420.00	643240.00	623200.00	617895.00	584006.67	604390.00
=====	=====	=====	=====	=====	=====	=====
Tetrachloro-m-xylene	1156200.0	1163100.0	1130500.0	1145300.0	1082450.0	1118837.5
Decachlorobiphenyl	1742300.0	1717600.0	1596650.0	1531712.5	1418600.0	1451331.3

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53 (mm)

Calibration Time(s): 1519

1810

COMPOUND	CURVE	COEFFICIENTS			%RSD	MAX %RSD
		A0	A1	A2	OR R^2	OR R^2
=====	=====	=====	=====	=====	=====	=====
alpha-BHC	2ORDR	1.213e-003	8.968e-007	-1.76e-012	0.9994761	0.9900000
gamma-BHC	2ORDR	9.75e-004	8.859e-007	-1.53e-012	0.9994627	0.9900000
Heptachlor	AVRG		1374272.22		3.424	20.000
Endosulfan I	AVRG		316531.250		1.770	20.000
Dieldrin	AVRG		1141078.13		6.561	20.000
Endrin	AVRG		838667.361		5.780	20.000
4,4'-DDD	AVRG		841197.917		10.179	20.000
4,4'-DDT	AVRG		1041193.06		7.076	20.000
Methoxychlor	AVRG		618691.944		3.586	20.000
=====	=====	=====	=====	=====	=====	=====
Tetrachloro-m-xylene	AVRG		1132731.25		2.606	20.000
Decachlorobiphenyl	AVRG		1576365.63		8.530	20.000

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53

(mm)

Calibration Time(s): 1844

2135

LAB FILE ID:

RF0.005: 012

RF0.01: 013

RF0.02: 014

RF0.04: 015

RF0.06: 016

RF0.08: 017

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
=====	=====	=====	=====	=====	=====	=====
beta-BHC	779600.00	682900.00	819250.00	774400.00	747550.00	757150.00
delta-BHC	4316	7873	20636	43136	67306	96565
Aldrin	1224000.0	1076600.0	1321850.0	1292725.0	1286950.0	1340325.0
Heptachlor epoxide	1407600.0	1155900.0	1415250.0	1299000.0	1260716.7	1287600.0
gamma-Chlordane	1396800.0	1205000.0	1430100.0	1346200.0	1308966.7	1337712.5
alpha-Chlordane	1371200.0	1193800.0	1412950.0	1339425.0	1321066.7	1346712.5
4,4'-DDE	303600.00	272750.00	343575.00	336837.50	328391.67	334500.00
Endosulfan II	1165100.0	1008900.0	1218525.0	1149975.0	1121858.3	1143275.0
Endrin aldehyde	1103800.0	929950.00	1104450.0	994512.50	953983.33	953756.25
Endosulfan sulfate	1034600.0	890200.00	1056650.0	998475.00	962850.00	988568.75
Endrin ketone	1211700.0	1052500.0	1293750.0	1232637.5	1197025.0	1225406.3

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP

ID: 0.53 (mm)

Calibration Time(s): 1844

2135

COMPOUND	CURVE	COEFFICIENTS			%RSD	MAX %RSD
		A0	A1	A2	OR R^2	OR R^2
beta-BHC	AVRG		760141.667		5.944	20.000
delta-BHC	2ORDR	1.36e-003	9.701e-007	-1.59e-012	0.9994617	0.9900000
Aldrin	AVRG		1257075.00		7.709	20.000
Heptachlor epoxide	AVRG		1304344.44		7.450	20.000
gamma-Chlordane	AVRG		1337463.19		5.843	20.000
alpha-Chlordane	AVRG		1330859.03		5.580	20.000
4,4'-DDE	AVRG		319942.361		8.412	20.000
Endosulfan II	AVRG		1134605.56		6.138	20.000
Endrin aldehyde	AVRG		1006742.01		7.771	20.000
Endosulfan sulfate	AVRG		988557.292		5.931	20.000
Endrin ketone	AVRG		1202169.79		6.693	20.000

FORM VI PEST

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i                      Injection Date: 24-FEB-2008 10:40  
Lab File ID: 040.D                         Init. Cal. Date(s): 23-FEB-2008    23-FEB-2008  
Analysis Type: WATER                      Init. Cal. Times:    15:19            21:35  
Lab Sample ID: INDB-CCV                   Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRFO.020	MIN RRF	MAX %D / %DRIFT	CURVE TYPE
4 beta-BHC	760142	778350	778350	0.010	-2.39539	Averaged
5 delta-BHC	0.02000	0.01997	991700	0.010	0.12774	Quadratic
7 Aldrin	1257075	1236900	1236900	0.010	1.60492	Averaged
8 Heptachlor epoxide	1304344	1335600	1335600	0.010	-2.39627	Averaged
9 gamma-Chlordane	1337463	1352350	1352350	0.010	-1.11306	Averaged
10 alpha-Chlordane	1330859	1307200	1307200	0.010	1.77773	Averaged
12 4,4'-DDE	319942	334425	334425	0.010	-4.52664	Averaged
16 Endosulfan II	1134606	1188675	1188675	0.010	-4.76548	Averaged
18 Endrin aldehyde	1006742	1101675	1101675	0.010	-9.42972	Averaged
19 Endosulfan sulfate	988557	1088675	1088675	0.010	-10.12766	Averaged
21 Endrin ketone	1202170	1347550	1347550	0.010	-12.09315	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 24-FEB-2008 11:53  
 Lab File ID: 042.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDA-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
\$ 1 Tetrachloro-m-xylene	1132731	1096050	1096050	0.010	3.23830	15.00000	Averaged
2 alpha-BHC	0.02000	0.01844	999600	0.010	7.80259	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01877	1041650	0.010	6.17493	15.00000	Quadratic
6 Heptachlor	1374272	1291200	1291200	0.010	6.04482	15.00000	Averaged
11 Endosulfan I	316531	298450	298450	0.010	5.71231	15.00000	Averaged
13 Dieldrin	1141078	1056575	1056575	0.010	7.40555	15.00000	Averaged
14 Endrin	838667	911100	911100	0.010	-8.63664	15.00000	Averaged
15 4,4'-DDD	841198	797375	797375	0.010	5.20958	15.00000	Averaged
17 4,4'-DDT	1041193	1025400	1025400	0.010	1.51682	15.00000	Averaged
20 Methoxychlor	618692	670130	670130	0.010	-8.31400	15.00000	Averaged
\$ 25 Decachlorobiphenyl	1576366	1769750	1769750	0.010	-12.26774	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i                      Injection Date: 24-FEB-2008 23:33  
Lab File ID: 061.D                      Init. Cal. Date(s): 23-FEB-2008    23-FEB-2008  
Analysis Type: WATER                      Init. Cal. Times:    15:19                      21:35  
Lab Sample ID: INDA-CCV                      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRFO.020	MIN RRF	MAX %D / %DRIFT	CURVE TYPE
1 Tetrachloro-m-xylene	1132731	1011800	1011800	0.010	10.67608	Averaged
2 alpha-BHC	0.02000	0.01700	913050	0.010	14.98259	Quadratic
3 gamma-BHC	0.02000	0.01724	949050	0.010	13.81305	Quadratic
6 Heptachlor	1374272	1170350	1170350	0.010	14.83856	Averaged
11 Endosulfan I	316531	273550	273550	0.010	13.57883	Averaged
13 Dieldrin	1141078	977275	977275	0.010	14.35512	Averaged
14 Endrin	838667	786800	786800	0.010	6.18450	Averaged
15 4,4'-DDD	841198	728525	728525	0.010	13.39434	Averaged
17 4,4'-DDT	1041193	933500	933500	0.010	10.34324	Averaged
20 Methoxychlor	618692	617625	617625	0.010	0.17245	Averaged
25 Decachlorobiphenyl	1576366	1544975	1544975	0.010	1.99133	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 25-FEB-2008 00:08  
 Lab File ID: 062.D Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 15:19 21:35  
 Lab Sample ID: INDB-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
14 beta-BHC	760142	686100	686100	0.010	9.74051	15.00000	Averaged
15 delta-BHC	0.02000	0.01758	860250	0.010	12.10447	15.00000	Quadratic
17 Aldrin	1257075	1096100	1096100	0.010	12.80552	15.00000	Averaged
18 Heptachlor epoxide	1304344	1192150	1192150	0.010	8.60160	15.00000	Averaged
19 gamma-Chlordane	1337463	1207300	1207300	0.010	9.73210	15.00000	Averaged
10 alpha-Chlordane	1330859	1173750	1173750	0.010	11.80508	15.00000	Averaged
12 4,4'-DDE	319942	293825	293825	0.010	8.16315	15.00000	Averaged
16 Endosulfan II	1134606	1058150	1058150	0.010	6.73851	15.00000	Averaged
18 Endrin aldehyde	1006742	973625	973625	0.010	3.28952	15.00000	Averaged
19 Endosulfan sulfate	988557	983800	983800	0.010	0.48124	15.00000	Averaged
21 Endrin ketone	1202170	1203475	1203475	0.010	-0.10857	15.00000	Averaged



FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm) Calibration Time(s): 1519 1810

LAB FILE ID: RF0.005: 006 RF0.01: 007 RF0.02: 008  
RF0.04: 009 RF0.06: 010 RF0.08: 011

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
=====	=====	=====	=====	=====	=====	=====
alpha-BHC	4366	9243	19463	45125	68168	96897
gamma-BHC	4659	9791	20206	45154	67093	94014
Heptachlor	1075800.0	1076200.0	1018500.0	1052350.0	1015966.7	1052237.5
Endosulfan I	245600.00	243300.00	238750.00	248175.00	240500.00	248050.00
Dieldrin	818800.00	828900.00	828575.00	875750.00	846383.33	880200.00
Endrin	555400.00	548800.00	540225.00	567687.50	546191.67	573825.00
4,4'-DDD	597000.00	613300.00	621125.00	653725.00	634558.33	659343.75
4,4'-DDT	711300.00	730350.00	717525.00	734662.50	710008.33	736912.50
Methoxychlor	398160.00	380230.00	348445.00	326115.00	300443.33	306826.25
=====	=====	=====	=====	=====	=====	=====
Tetrachloro-m-xylene	975000.00	961700.00	898100.00	877925.00	815966.67	819412.50
Decachlorobiphenyl	1327300.0	1236550.0	1098100.0	991950.00	897141.67	891937.50
=====	=====	=====	=====	=====	=====	=====

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 1519 1810

COMPOUND	CURVE	COEFFICENTS			%RSD	MAX %RSD
		A0	A1	A2	OR R^2	OR R^2
=====	=====	=====	=====	=====	=====	=====
alpha-BHC	2ORDR	1.336e-003	9.397e-007	-1.31e-012	0.9994175	0.9900000
gamma-BHC	2ORDR	9.163e-004	9.317e-007	-9.41e-013	0.9994792	0.9900000
Heptachlor	AVRG		1048509.03		2.523	20.000
Endosulfan I	AVRG		244062.500		1.604	20.000
Dieldrin	AVRG		846434.722		3.076	20.000
Endrin	AVRG		555354.861		2.346	20.000
4,4'-DDD	AVRG		629842.014		3.818	20.000
4,4'-DDT	AVRG		723459.722		1.656	20.000
Methoxychlor	AVRG		343369.931		11.548	20.000
=====	=====	=====	=====	=====	=====	=====
Tetrachloro-m-xylene	AVRG		891350.694		7.614	20.000
Decachlorobiphenyl	AVRG		1073829.86		16.779	20.000

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 1844

2135

LAB FILE ID:

RF0.005: 012

RF0.01: 013

RF0.02: 014

RF0.04: 015

RF0.06: 016

RF0.08: 017

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
=====	=====	=====	=====	=====	=====	=====
beta-BHC	774400.00	656400.00	754850.00	674025.00	631650.00	620262.50
delta-BHC	4184	7319	19399	39861	60746	84295
Aldrin	1011600.0	880600.00	1062900.0	1024875.0	1002283.3	1016825.0
Heptachlor epoxide	1078600.0	918000.00	1049200.0	974875.00	934800.00	937175.00
gamma-Chlordane	1127800.0	960600.00	1088500.0	998250.00	953516.67	954600.00
alpha-Chlordane	1235600.0	969100.00	1133650.0	1007350.0	954050.00	952775.00
4,4'-DDE	235800.00	213600.00	270650.00	260587.50	248450.00	250243.75
Endosulfan II	922100.00	784900.00	919400.00	845975.00	799233.33	793168.75
Endrin aldehyde	870700.00	711700.00	804750.00	698562.50	654216.67	640612.50
Endosulfan sulfate	767700.00	648600.00	758975.00	700837.50	663850.00	668818.75
Endrin ketone	962900.00	792950.00	965100.00	868362.50	818233.33	818743.75

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/23/08 02/23/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 1844 2135

COMPOUND	CURVE	COEFFICIENTS			%RSD	MAX %RSD
		A0	A1	A2	OR R^2	OR R^2
beta-BHC	AVRG		685264.583		9.423	20.000
delta-BHC	2ORDR	1.459e-003	1.007e-006	-8.66e-013	0.9993746	0.9900000
Aldrin	AVRG		999847.222		6.206	20.000
Heptachlor epoxide	AVRG		982108.333		6.789	20.000
gamma-Chlordane	AVRG		1013877.78		7.484	20.000
alpha-Chlordane	AVRG		1042087.50		11.198	20.000
4,4'-DDE	AVRG		246555.208		8.104	20.000
Endosulfan II	AVRG		844129.514		7.468	20.000
Endrin aldehyde	AVRG		730090.278		12.318	20.000
Endosulfan sulfate	AVRG		701463.542		7.261	20.000
Endrin ketone	AVRG		871048.264		8.730	20.000

FORM VI PEST

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i      Injection Date: 24-FEB-2008 10:40

Lab File ID: 040.D        Init. Cal. Date(s): 23-FEB-2008    23-FEB-2008

Analysis Type: WATER      Init. Cal. Times:    15:19        21:35

Lab Sample ID: INDB-CCV    Quant Type:    ESTD

Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
4 beta-BHC	685265	712700	712700	0.010	-4.00362	15.00000	Averaged
5 delta-BHC	0.02000	0.01990	930250	0.010	0.50844	15.00000	Quadratic
7 Aldrin	999847	979350	979350	0.010	2.05004	15.00000	Averaged
8 Heptachlor epoxide	982108	1029750	1029750	0.010	-4.85096	15.00000	Averaged
9 gamma-Chlordane	1013878	1023850	1023850	0.010	-0.98357	15.00000	Averaged
10 alpha-Chlordane	1042088	1088450	1088450	0.010	-4.44900	15.00000	Averaged
12 4,4'-DDE	246555	265900	265900	0.010	-7.84603	15.00000	Averaged
16 Endosulfan II	844130	884525	884525	0.010	-4.78546	15.00000	Averaged
18 Endrin aldehyde	730090	791000	791000	0.010	-8.34277	15.00000	Averaged
19 Endosulfan sulfate	701464	771975	771975	0.010	-10.05205	15.00000	Averaged
21 Endrin ketone	871048	976575	976575	0.010	-12.11491	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i                    Injection Date: 24-FEB-2008 11:53  
Lab File ID: 042.D                    Init. Cal. Date(s): 23-FEB-2008    23-FEB-2008  
Analysis Type: WATER                    Init. Cal. Times:    15:19            21:35  
Lab Sample ID: INDA-CCV                    Quant Type: ESTD  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL	MIN	MAX	CURVE TYPE
				RRF %D / %DRIFT	%D / %DRIFT	
\$ 1 Tetrachloro-m-xylene	891351	872000	872000	0.010	2.17094	Averaged
2 alpha-BHC	0.02000	0.01861	943650	0.010	6.96596	Quadratic
3 gamma-BHC	0.02000	0.01890	984600	0.010	5.50485	Quadratic
6 Heptachlor	1048509	1000250	1000250	0.010	4.60263	Averaged
11 Endosulfan I	244063	230350	230350	0.010	5.61844	Averaged
13 Dieldrin	846435	802350	802350	0.010	5.20828	Averaged
14 Endrin	555355	590900	590900	0.010	-6.40044	Averaged
15 4,4'-DDD	629842	576525	576525	0.010	8.46514	Averaged
17 4,4'-DDT	723460	711200	711200	0.010	1.69460	Averaged
20 Methoxychlor	343370	379375	379375	0.010	-10.48580	Averaged
\$ 25 Decachlorobiphenyl	1073830	1089975	1089975	0.010	-1.50351	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i      Injection Date: 24-FEB-2008 23:33

Lab File ID: 061.D      Init. Cal. Date(s): 23-FEB-2008    23-FEB-2008

Analysis Type: WATER      Init. Cal. Times:    15:19      21:35

Lab Sample ID: INDA-CCV      Quant Type:    ESTD

Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

			CCAL	MIN		MAX	
COMPOUND	RRF / AMOUNT	RF0.020	RRF0.020	RRF	%D / %DRIFT	%D / %DRIFT	CURVE TYPE
\$ 1 Tetrachloro-m-xylene	891351	801200	801200	0.010	10.11394	15.00000	Averaged
2 alpha-BHC	0.02000	0.01702	854950	0.010	14.88483	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01710	884300	0.010	14.49731	15.00000	Quadratic
6 Heptachlor	1048509	896700	896700	0.010	14.47856	15.00000	Averaged
11 Endosulfan I	244063	210950	210950	0.010	13.56722	15.00000	Averaged
13 Dieldrin	846435	730575	730575	0.010	13.68797	15.00000	Averaged
14 Endrin	555355	508725	508725	0.010	8.39641	15.00000	Averaged
15 4,4'-DDD	629842	536175	536175	0.010	14.87151	15.00000	Averaged
17 4,4'-DDT	723460	650150	650150	0.010	10.13321	15.00000	Averaged
20 Methoxychlor	343370	350680	350680	0.010	-2.12892	15.00000	Averaged
\$ 25 Decachlorobiphenyl	1073830	1034425	1034425	0.010	3.66956	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i  
Lab File ID: 062.D  
Analysis Type: WATER  
Lab Sample ID: INDB-CCV  
Method: \\Nitro\chem\ECD-1.i\080223.b\8081.m\8081.m

Injection Date: 25-FEB-2008 00:08  
Init. Cal. Date(s): 23-FEB-2008 23-FEB-2008  
Init. Cal. Times: 15:19 21:35  
Quant Type: ESTD

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
4 beta-BHC	685265	624300	624300	0.010	8.89650	15.00000	Averaged
5 delta-BHC	0.02000	0.01728	796100	0.010	13.61898	15.00000	Quadratic
7 Aldrin	999847	872300	872300	0.010	12.75667	15.00000	Averaged
8 Heptachlor epoxide	982108	898450	898450	0.010	8.51824	15.00000	Averaged
9 gamma-Chlordane	1013878	904200	904200	0.010	10.81765	15.00000	Averaged
10 alpha-Chlordane	1042088	964100	964100	0.010	7.48378	15.00000	Averaged
12 4,4'-DDE	246555	228975	228975	0.010	7.13033	15.00000	Averaged
16 Endosulfan II	844130	779700	779700	0.010	7.63266	15.00000	Averaged
18 Endrin aldehyde	730090	693550	693550	0.010	5.00490	15.00000	Averaged
19 Endosulfan sulfate	701464	689500	689500	0.010	1.70551	15.00000	Averaged
21 Endrin ketone	871048	865125	865125	0.010	0.68002	15.00000	Averaged



FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/18/08 02/19/08

Column: RTX-CLP

ID: 0.53

(mm)

Calibration Time(s): 2237

0127

LAB FILE ID:

RF0.005: 018

RF0.01: 019

RF0.02: 020

RF0.04: 021

RF0.06: 022

RF0.08: 023

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
alpha-BHC	3325	6702	13690	34506	60539	84628
gamma-BHC	3517	7064	14335	35421	60524	83906
Heptachlor	889800.00	867800.00	837100.00	951375.00	1027166.7	1042425.0
Endosulfan I	220200.00	213100.00	205950.00	230550.00	245816.67	245087.50
Dieldrin	762600.00	747650.00	748125.00	882350.00	969600.00	979356.25
Endrin	589400.00	573000.00	569550.00	672300.00	734341.67	745962.50
4,4'-DDD	564100.00	556150.00	569450.00	690950.00	754658.33	766931.25
4,4'-DDT	687700.00	677900.00	677950.00	804812.50	853275.00	871275.00
Methoxychlor	521320.00	498440.00	476870.00	512915.00	506420.00	496417.50
Tetrachloro-m-xylene	829800.00	806900.00	770450.00	845600.00	881033.33	863762.50
Decachlorobiphenyl	1371800.0	1280400.0	1201600.0	1239812.5	1222766.7	1171868.8

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/18/08 02/19/08

Column: RTX-CLP ID: 0.53 (mm)

Calibration Time(s): 2237 0127

COMPOUND	CURVE	COEFFICIENTS			%RSD	MAX %RSD
		A0	A1	A2	OR R^2	OR R^2
alpha-BHC	2ORDR	2.569e-003	1.169e-006	-3.12e-012	0.9974819	0.9900000
gamma-BHC	2ORDR	2.266e-003	1.146e-006	-2.71e-012	0.9980266	0.9900000
Heptachlor	AVRG		935944.444		9.121	20.000
Endosulfan I	AVRG		226784.028		7.315	20.000
Dieldrin	AVRG		848280.208		12.974	20.000
Endrin	AVRG		647425.694		12.520	20.000
4,4'-DDD	AVRG		650373.264		15.218	20.000
4,4'-DDT	AVRG		762152.083		11.991	20.000
Methoxychlor	AVRG		502063.750		3.069	20.000
Tetrachloro-m-xylene	AVRG		832924.306		4.807	20.000
Decachlorobiphenyl	AVRG		1248041.32		5.669	20.000

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/19/08 02/19/08

Column: RTX-CLP

ID: 0.53

(mm)

Calibration Time(s): 0202

0452

LAB FILE ID:

RF0.005: 024

RF0.01: 025

RF0.02: 026

RF0.04: 027

RF0.06: 028

RF0.08: 029

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
=====	=====	=====	=====	=====	=====	=====
beta-BHC	525000.00	558400.00	475900.00	637725.00	594933.33	601637.50
delta-BHC	2882	6268	11372	34679	52301	74784
Aldrin	780000.00	832900.00	715150.00	1012800.0	979166.67	1019600.0
Heptachlor epoxide	872600.00	911400.00	771850.00	1027125.0	971583.33	991375.00
gamma-Chlordane	918200.00	960800.00	811500.00	1081450.0	1021350.0	1040025.0
alpha-Chlordane	858000.00	918800.00	789050.00	1075675.0	1026600.0	1044712.5
4,4'-DDE	200000.00	217800.00	190150.00	280162.50	267875.00	272837.50
Endosulfan II	797300.00	823950.00	703050.00	937862.50	900833.33	912125.00
Endrin aldehyde	731300.00	765700.00	663950.00	819737.50	782700.00	765325.00
Endosulfan sulfate	731800.00	768800.00	662400.00	847687.50	814825.00	812375.00
Endrin ketone	847500.00	913150.00	804625.00	1055712.5	1023591.7	1016600.0

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/19/08 02/19/08

Column: RTX-CLP

ID: 0.53 (mm)

Calibration Time(s): 0202

0452

COMPOUND	CURVE	COEFFICIENTS			%RSD	MAX %RSD
		A0	A1	A2	OR R^2	OR R^2
beta-BHC	AVRG		565599.306		10.342	20.000
delta-BHC	2ORDR	3.248e-003	1.189e-006	-2.18e-012	0.9956572	0.9900000
Aldrin	AVRG		889936.111		14.716	20.000
Heptachlor epoxide	AVRG		924322.222		10.078	20.000
gamma-Chlordane	AVRG		972220.833		10.059	20.000
alpha-Chlordane	AVRG		952139.583		12.062	20.000
4,4'-DDE	AVRG		238137.500		16.824	20.000
Endosulfan II	AVRG		845853.472		10.456	20.000
Endrin aldehyde	AVRG		754785.417		7.018	20.000
Endosulfan sulfate	AVRG		772981.250		8.741	20.000
Endrin ketone	AVRG		943529.861		10.991	20.000

FORM VI PEST

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i                      Injection Date: 19-FEB-2008 15:41  
Lab File ID: 048.D                          Init. Cal. Date(s): 18-FEB-2008    19-FEB-2008  
Analysis Type: WATER                      Init. Cal. Times:    21:29                      04:52  
Lab Sample ID: INDA-CCV                   Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-1.i\080218.b\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRFO.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
\$ 1 Tetrachloro-m-xylene	832924	796600	796600	0.010	4.36106	15.00000	Averaged
2 alpha-BHC	0.02000	0.01864	714450	0.010	6.80834	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01864	740450	0.010	6.82381	15.00000	Quadratic
6 Heptachlor	935944	909600	909600	0.010	2.81474	15.00000	Averaged
11 Endosulfan I	226784	214250	214250	0.010	5.52686	15.00000	Averaged
13 Dieldrin	848280	772725	772725	0.010	8.90687	15.00000	Averaged
14 Endrin	647426	632600	632600	0.010	2.28995	15.00000	Averaged
15 4,4'-DDD	650373	590225	590225	0.010	9.24827	15.00000	Averaged
17 4,4'-DDT	762152	746125	746125	0.010	2.10287	15.00000	Averaged
20 Methoxychlor	502064	519145	519145	0.010	-3.40221	15.00000	Averaged
\$ 25 Decachlorobiphenyl	1248041	1253125	1253125	0.010	-0.40733	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i                      Injection Date: 19-FEB-2008 16:15  
Lab File ID: 049.D                         Init. Cal. Date(s): 18-FEB-2008    19-FEB-2008  
Analysis Type: WATER                      Init. Cal. Times:    21:29                      04:52  
Lab Sample ID: INDB-CCV                   Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-1.i\080218.b\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRFO.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
4 beta-BHC	565599	505450	505450	0.010	10.63461	15.00000	Averaged
5 delta-BHC	0.02000	0.01739	608200	0.010	13.07353	15.00000	Quadratic
7 Aldrin	889936	764400	764400	0.010	14.10619	15.00000	Averaged
8 Heptachlor epoxide	924322	825100	825100	0.010	10.73459	15.00000	Averaged
9 gamma-Chlordane	972221	880600	880600	0.010	9.42387	15.00000	Averaged
10 alpha-Chlordane	952140	870350	870350	0.010	8.59008	15.00000	Averaged
12 4,4'-DDE	238138	204925	204925	0.010	13.94677	15.00000	Averaged
16 Endosulfan II	845853	760850	760850	0.010	10.04943	15.00000	Averaged
18 Endrin aldehyde	754785	721100	721100	0.010	4.46291	15.00000	Averaged
19 Endosulfan sulfate	772981	741425	741425	0.010	4.08241	15.00000	Averaged
21 Endrin ketone	943530	906100	906100	0.010	3.96700	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i      Injection Date: 20-FEB-2008 04:15  
 Lab File ID: 070.D      Init. Cal. Date(s): 18-FEB-2008    19-FEB-2008  
 Analysis Type: WATER      Init. Cal. Times:    21:29      04:52  
 Lab Sample ID: INDA-CCV      Quant Type:    ESTD  
 Method: \\Nitro\chem\ECD-1.i\080218.b\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RRFO.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1 Tetrachloro-m-xylene	832924	901900	901900	0.010	-8.28115	15.00000	Averaged
2 alpha-BHC	0.02000	0.02075	812550	0.010	-3.72742	15.00000	Quadratic
3 gamma-BHC	0.02000	0.02098	851100	0.010	-4.89625	15.00000	Quadratic
6 Heptachlor	935944	1010000	1010000	0.010	-7.91239	15.00000	Averaged
11 Endosulfan I	226784	239750	239750	0.010	-5.71732	15.00000	Averaged
13 Dieldrin	848280	871725	871725	0.010	-2.76380	15.00000	Averaged
14 Endrin	647426	698350	698350	0.010	-7.86566	15.00000	Averaged
15 4,4'-DDD	650373	668500	668500	0.010	-2.78713	15.00000	Averaged
17 4,4'-DDT	762152	831925	831925	0.010	-9.15472	15.00000	Averaged
20 Methoxychlor	502064	566385	566385	0.010	-12.81137	15.00000	Averaged
25 Decachlorobiphenyl	1248041	1354300	1354300	0.010	-8.51404	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i                      Injection Date: 20-FEB-2008 04:49  
Lab File ID: 071.D                         Init. Cal. Date(s): 18-FEB-2008    19-FEB-2008  
Analysis Type: WATER                      Init. Cal. Times:    21:29                      04:52  
Lab Sample ID: INDB-CCV                   Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-1.i\080218.b\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL	MIN	MAX	CURVE TYPE
				RRF	%D / %DRIFT	%D / %DRIFT
14 beta-BHC	565599	614300	614300	0.010	-8.61046	15.00000
15 delta-BHC	0.02000	0.02061	751150	0.010	-3.07219	15.00000
17 Aldrin	889936	929550	929550	0.010	-4.45132	15.00000
18 Heptachlor epoxide	924322	992700	992700	0.010	-7.39761	15.00000
19 gamma-Chlordane	972221	1048800	1048800	0.010	-7.87673	15.00000
110 alpha-Chlordane	952140	1036200	1036200	0.010	-8.82858	15.00000
112 4,4'-DDE	238138	247050	247050	0.010	-3.74259	15.00000
116 Endosulfan II	845853	900600	900600	0.010	-6.47234	15.00000
118 Endrin aldehyde	754785	846800	846800	0.010	-12.19083	15.00000
119 Endosulfan sulfate	772981	855100	855100	0.010	-10.62364	15.00000
121 Endrin ketone	943530	1048425	1048425	0.010	-11.11731	15.00000



FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/18/08 02/19/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 2237

0127

LAB FILE ID:

RF0.005: 018

RF0.01: 019

RF0.02: 020

RF0.04: 021

RF0.06: 022

RF0.08: 023

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
=====	=====	=====	=====	=====	=====	=====
alpha-BHC	3226	6422	13109	32566	54855	74531
gamma-BHC	3449	6791	13703	33004	54185	72708
Heptachlor	814000.00	761800.00	719250.00	790600.00	829516.67	823187.50
Endosulfan I	180000.00	171700.00	164950.00	183925.00	194250.00	192600.00
Dieldrin	625200.00	598350.00	586250.00	669775.00	711858.33	702156.25
Endrin	412500.00	389600.00	377075.00	429012.50	454808.33	453818.75
4,4'-DDD	453200.00	441450.00	436725.00	510875.00	537416.67	532493.75
4,4'-DDT	562900.00	545400.00	523450.00	580800.00	594591.67	593062.50
Methoxychlor	363140.00	327610.00	299800.00	299992.50	287493.33	277025.00
=====	=====	=====	=====	=====	=====	=====
Tetrachloro-m-xylene	753800.00	711700.00	658350.00	682500.00	688933.33	663000.00
Decachlorobiphenyl	1136100.0	998600.00	885750.00	845675.00	806091.67	757968.75

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/18/08 02/19/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 2237 0127

COMPOUND	CURVE	COEFFICIENTS			%RSD OR R^2	MAX %RSD OR R^2
		A0	A1	A2		
alpha-BHC	2ORDR	2.428e-003	1.223e-006	-2.59e-012	0.9978191	0.9900000
gamma-BHC	2ORDR	2.058e-003	1.204e-006	-1.95e-012	0.9982385	0.9900000
Heptachlor	AVRG		789725.694		5.384	20.000
Endosulfan I	AVRG		181237.500		6.356	20.000
Dieldrin	AVRG		648931.597		8.235	20.000
Endrin	AVRG		419469.097		7.731	20.000
4,4'-DDD	AVRG		485360.069		9.624	20.000
4,4'-DDT	AVRG		566700.694		4.998	20.000
Methoxychlor	AVRG		309176.806		10.154	20.000
Tetrachloro-m-xylene	AVRG		693047.222		5.111	20.000
Decachlorobiphenyl	AVRG		905030.903		15.426	20.000

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/19/08 02/19/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 0202

0452

LAB FILE ID:

RF0.005: 024

RF0.01: 025

RF0.02: 026

RF0.04: 027

RF0.06: 028

RF0.08: 029

COMPOUND	RF0.005	RF0.01	RF0.02	RF0.04	RF0.06	RF0.08
beta-BHC	518000.00	533200.00	443350.00	557400.00	505333.33	496837.50
delta-BHC	2815	6047	10732	32240	47598	66105
Aldrin	712000.00	730600.00	612850.00	833550.00	786183.33	798575.00
Heptachlor epoxide	744000.00	757200.00	624050.00	804200.00	746533.33	747187.50
gamma-Chlordane	773200.00	782600.00	646400.00	820325.00	758533.33	756675.00
alpha-Chlordane	754000.00	770100.00	646750.00	825350.00	761133.33	758212.50
4,4'-DDE	161700.00	175450.00	155800.00	220737.50	204350.00	203718.75
Endosulfan II	633700.00	662050.00	560200.00	708137.50	658125.00	648625.00
Endrin aldehyde	589900.00	591300.00	496825.00	578912.50	539116.67	518581.25
Endosulfan sulfate	554600.00	562800.00	478750.00	597900.00	562850.00	555518.75
Endrin ketone	657400.00	692250.00	601400.00	751712.50	712725.00	694668.75

FORM VI PEST

FORM 6  
PESTICIDE INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00250

Instrument ID: ECD-1

Calibration Date(s): 02/19/08 02/19/08

Column: RTX-CLP2 ID: 0.53 (mm)

Calibration Time(s): 0202 0452

COMPOUND	CURVE	COEFFICIENTS			%RSD	MAX %RSD
		A0	A1	A2	OR R^2	OR R^2
beta-BHC	AVRG		509020.139		7.599	20.000
delta-BHC	2ORDR	3.212e-003	1.238e-006	-1.18e-012	0.9953828	0.9900000
Aldrin	AVRG		745626.389		10.588	20.000
Heptachlor epoxide	AVRG		737195.139		8.122	20.000
gamma-Chlordane	AVRG		756288.889		7.746	20.000
alpha-Chlordane	AVRG		752590.972		7.727	20.000
4,4'-DDE	AVRG		186959.375		14.082	20.000
Endosulfan II	AVRG		645139.583		7.524	20.000
Endrin aldehyde	AVRG		552439.236		7.255	20.000
Endosulfan sulfate	AVRG		552069.792		7.120	20.000
Endrin ketone	AVRG		685026.042		7.477	20.000

FORM VI PEST

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i                      Injection Date: 19-FEB-2008 15:41  
Lab File ID: 048.D                         Init. Cal. Date(s): 18-FEB-2008    19-FEB-2008  
Analysis Type: WATER                      Init. Cal. Times:    21:29                      04:52  
Lab Sample ID: INDA-CCV                   Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-1.i\080218.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL RRF0.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
\$ 1 Tetrachloro-m-xylene	693047	679550	679550	0.010	1.94752	15.00000	Averaged
2 alpha-BHC	0.02000	0.01876	687650	0.010	6.19960	15.00000	Quadratic
3 gamma-BHC	0.02000	0.01903	721950	0.010	4.83721	15.00000	Quadratic
6 Heptachlor	789726	752650	752650	0.010	4.69476	15.00000	Averaged
11 Endosulfan I	181238	169050	169050	0.010	6.72460	15.00000	Averaged
13 Dieldrin	648932	606100	606100	0.010	6.60033	15.00000	Averaged
14 Endrin	419469	427825	427825	0.010	-1.99202	15.00000	Averaged
15 4,4'-DDD	485360	464850	464850	0.010	4.22574	15.00000	Averaged
17 4,4'-DDT	566701	549550	549550	0.010	3.02641	15.00000	Averaged
20 Methoxychlor	309177	316860	316860	0.010	-2.48505	15.00000	Averaged
\$ 25 Decachlorobiphenyl	905031	906425	906425	0.010	-0.15404	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i  
Lab File ID: 049.D  
Analysis Type: WATER  
Lab Sample ID: INDB-CCV  
Method: \\Nitro\chem\ECD-1.i\080218.b\8081.m\8081.m

Injection Date: 19-FEB-2008 16:15  
Init. Cal. Date(s): 18-FEB-2008 19-FEB-2008  
Init. Cal. Times: 21:29 04:52  
Quant Type: ESTD

COMPOUND	CCAL		MIN		MAX		CURVE TYPE
	RRF / AMOUNT	RFO.020	RRFO.020	RRF	%D / %DRIFT	%D / %DRIFT	
14 beta-BHC	509020	477650	477650	0.010	6.16285	15.00000	Averaged
15 delta-BHC	0.02000	0.01777	594450	0.010	11.16188	15.00000	Quadratic
17 Aldrin	745626	671350	671350	0.010	9.96161	15.00000	Averaged
18 Heptachlor epoxide	737195	670350	670350	0.010	9.06750	15.00000	Averaged
19 gamma-Chlordane	756289	690800	690800	0.010	8.65924	15.00000	Averaged
10 alpha-Chlordane	752591	694950	694950	0.010	7.65900	15.00000	Averaged
12 4,4'-DDE	186959	168625	168625	0.010	9.80661	15.00000	Averaged
16 Endosulfan II	645140	616800	616800	0.010	4.39278	15.00000	Averaged
18 Endrin aldehyde	552439	535850	535850	0.010	3.00291	15.00000	Averaged
19 Endosulfan sulfate	552070	534025	534025	0.010	3.26857	15.00000	Averaged
21 Endrin ketone	685026	671600	671600	0.010	1.95993	15.00000	Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i      Injection Date: 20-FEB-2008 04:15  
Lab File ID: 070.D      Init. Cal. Date(s): 18-FEB-2008    19-FEB-2008  
Analysis Type: WATER      Init. Cal. Times:    21:29      04:52  
Lab Sample ID: INDA-CCV      Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-1.i\080218.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RF0.020	CCAL	MIN	MAX	CURVE TYPE
			RRF0.020	RRF	%D / %DRIFT	%D / %DRIFT
\$ 1 Tetrachloro-m-xylene	693047	770700	770700	0.010	-11.20454	15.00000
2 alpha-BHC	0.02000	0.02141	803250	0.010	-7.04786	15.00000
3 gamma-BHC	0.02000	0.02170	838800	0.010	-8.51740	15.00000
6 Heptachlor	789726	865400	865400	0.010	-9.58235	15.00000
11 Endosulfan I	181238	194050	194050	0.010	-7.06945	15.00000
13 Dieldrin	648932	694350	694350	0.010	-6.99895	15.00000
14 Endrin	419469	448075	448075	0.010	-6.81955	15.00000
15 4,4'-DDD	485360	489925	489925	0.010	-0.94052	15.00000
17 4,4'-DDT	566701	630850	630850	0.010	-11.31979	15.00000
20 Methoxychlor	309177	348085	348085	0.010	-12.58445	15.00000
\$ 25 Decachlorobiphenyl	905031	981225	981225	0.010	-8.41895	15.00000

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-1.i Injection Date: 20-FEB-2008 04:49  
 Lab File ID: 071.D Init. Cal. Date(s): 18-FEB-2008 19-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 21:29 04:52  
 Lab Sample ID: INDB-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-1.i\080218.b\8081.m\8081.m

COMPOUND	RRF / AMOUNT	RFO.020	CCAL RFO.020	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
14 beta-BHC	509020	580900	580900	0.010	-14.12122	15.00000	Averaged
15 delta-BHC	0.02000	0.02143	746350	0.010	-7.16663	15.00000	Quadratic
17 Aldrin	745626	815400	815400	0.010	-9.35772	15.00000	Averaged
18 Heptachlor epoxide	737195	807200	807200	0.010	-9.49611	15.00000	Averaged
19 gamma-Chlordane	756289	833250	833250	0.010	-10.17615	15.00000	Averaged
110 alpha-Chlordane	752591	823750	823750	0.010	-9.45521	15.00000	Averaged
112 4,4'-DDE	186959	205325	205325	0.010	-9.82332	15.00000	Averaged
116 Endosulfan II	645140	737175	737175	0.010	-14.26597	15.00000	Averaged
118 Endrin aldehyde	552439	626775	626775	0.010	-13.45592	15.00000	Averaged
119 Endosulfan sulfate	552070	632650	632650	0.010	-14.59602	15.00000	Averaged
121 Endrin ketone	685026	776975	776975	0.010	-13.42270	15.00000	Averaged



FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP

ID: 0.50

(mm)

Calibration Time(s): 1704

2048

LAB FILE ID:

RF0.02: 006

RF0.04: 007

RF0.08: 008

RF0.2: 009

RF0.5: 010

RF0.7: 011

COMPOUND	RF0.02	RF0.04	RF0.08	RF0.2	RF0.5	RF0.7
=====	=====	=====	=====	=====	=====	=====
2,4-DB	5108	9719	18353	41322	87879	118108
Dicamba	12307	22969	42954	95072	203285	268904
Dichlorprop	9154	16682	30960	65694	134828	175040
Dalapon	6745	11203	19791	42458	87260	110919
Dinoseb	5342	11986	42389	58458	126744	188628
MCPA	12002	18958	30045	52002	92400	114748
MCPP	6640	11132	18174	32745	58460	72824
2,4,5-TP (Silvex)	7923	14045	28145	67736	154903	206955
2,4,5-T	7840	14982	30069	70942	158635	210003
2,4-D	10207	18232	33189	70147	141447	183884
=====	=====	=====	=====	=====	=====	=====
DCAA	9088	16340	28995	60056	121328	157601

FORM VI HERB

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP

ID: 0.50 (mm)

Calibration Time(s): 1704

2048

RF1: 012

COMPOUND	RF1	CURVE	COEFFICIENTS			%RSD OR R^2	MP
			A0	A1	A2		
=====	=====	=====	=====	=====	=====	=====	==
2,4-DB	157499	2ORDR	-9.04e-003	4.822e-006	1.01e-011	0.9998403	C
Dicamba	356790	2ORDR	-4.28e-003	1.013e-006	1.126e-012	0.9999391	C
Dichlorprop	228577	2ORDR	-9.79e-003	2.795e-006	7.136e-012	0.9999235	C
Dalapon	147393	2ORDR	-7.33e-003	2.268e-006	8.085e-012	0.9996880	C
Dinoseb	271766	2ORDR	-6.2e-003	9.93e-007	-1.68e-013	0.9932724	C
MCPA	141799	2ORDR	-1.9041304	2.504e-004	3.303e-009	0.9998884	C
MCPP	91657	2ORDR	-2.0604654	4.603e-004	7.178e-009	0.9997430	C
2,4,5-TP (Silvex)	266465	2ORDR	1.51e-003	6.045e-007	1.208e-012	0.9996141	C
2,4,5-T	281777	2ORDR	-4.61e-004	6.635e-007	8.038e-013	0.9999780	C
2,4-D	244226	2ORDR	-1.61e-002	2.855e-006	5.423e-012	0.9996761	C
=====	=====	=====	=====	=====	=====	=====	==
DCAA	206190	2ORDR	-1.48e-002	3.168e-006	8.563e-012	0.9998612	C

FORM VI HERB

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i      Injection Date: 24-FEB-2008 10:49  
Lab File ID: 042.D      Init. Cal. Date(s): 18-NOV-2003      21-FEB-2008  
Analysis Type: WATER      Init. Cal. Times: 10:47      20:48  
Lab Sample ID: HSTD-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	CCAL RRF0.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
1\$ 2 DCAA	0.50000	0.53731	258336	0.001	-7.46261	15.00000	Quadratic
1 Dalapon	0.25000	0.27749	376236	0.001	-10.99699	15.00000	Quadratic
3 Dicamba	0.25000	0.26678	863052	0.001	-6.71144	15.00000	Quadratic
4 MCPP	50.00000	51.71683	1205	0.001	-3.43365	15.00000	Quadratic
5 MCPA	50.00000	51.20469	1889	0.001	-2.40938	15.00000	Quadratic
6 Dichlorprop	0.50000	0.52565	281796	0.001	-5.12902	15.00000	Quadratic
7 2,4-D	0.50000	0.51129	289722	0.001	-2.25873	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.13289	1309888	0.001	-6.30811	15.00000	Quadratic
10 2,4,5-T	0.12500	0.12678	1284320	0.001	-1.42146	15.00000	Quadratic
11 2,4-DB	0.50000	0.48285	172760	0.001	3.42934	15.00000	Quadratic
12 Dinoseb	0.12500	0.13366	1154928	0.001	-6.92564	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i      Injection Date: 24-FEB-2008 22:14

Lab File ID: 060.D      Init. Cal. Date(s): 18-NOV-2003    21-FEB-2008

Analysis Type: WATER      Init. Cal. Times:    10:47      20:48

Lab Sample ID: HSTD-CCV      Quant Type:    ESTD

Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
2 DCAA	0.50000	0.50678	246880	0.001	-1.35502	15.00000	Quadratic
1 Dalapon	0.25000	0.25245	349412	0.001	-0.97995	15.00000	Quadratic
3 Dicamba	0.25000	0.24917	815640	0.001	0.33341	15.00000	Quadratic
4 MCPP	50.00000	50.52478	1187	0.001	-1.04956	15.00000	Quadratic
5 MCPA	50.00000	45.15155	1747	0.001	9.69690	15.00000	Quadratic
6 Dichlorprop	0.50000	0.50502	273156	0.001	-1.00361	15.00000	Quadratic
7 2,4-D	0.50000	0.53555	300610	0.001	-7.11041	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12710	1263288	0.001	-1.67989	15.00000	Quadratic
10 2,4,5-T	0.12500	0.12805	1295360	0.001	-2.44012	15.00000	Quadratic
11 2,4-DB	0.50000	0.50456	179338	0.001	-0.91216	15.00000	Quadratic
12 Dinoseb	0.12500	0.12716	1099960	0.001	-1.72761	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 25-FEB-2008 03:48  
 Lab File ID: 069.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
2 DCAA	0.50000	0.50051	244504	0.001	-0.10237	15.00000	Quadratic
1 Dalapon	0.25000	0.24676	343204	0.001	1.29689	15.00000	Quadratic
3 Dicamba	0.25000	0.24613	807376	0.001	1.54838	15.00000	Quadratic
4 MCPP	50.00000	50.05595	1180	0.001	-0.11190	15.00000	Quadratic
5 MCPA	50.00000	44.58560	1733	0.001	10.82879	15.00000	Quadratic
6 Dichlorprop	0.50000	0.49980	270952	0.001	0.04022	15.00000	Quadratic
7 2,4-D	0.50000	0.53677	301152	0.001	-7.35360	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12556	1250768	0.001	-0.44762	15.00000	Quadratic
10 2,4,5-T	0.12500	0.12695	1285800	0.001	-1.55788	15.00000	Quadratic
11 2,4-DB	0.50000	0.50242	178692	0.001	-0.48386	15.00000	Quadratic
12 Dinoseb	0.12500	0.12606	1090704	0.001	-0.85107	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i                    Injection Date: 26-FEB-2008 08:37  
Lab File ID: 073.D                      Init. Cal. Date(s): 18-NOV-2003    21-FEB-2008  
Analysis Type: WATER                    Init. Cal. Times:    10:47                    20:48  
Lab Sample ID: HSTD-CCV                Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	CCAL RRF0.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
\$ 2 DCAA	0.50000	0.55554	265074	0.001	-11.10735	15.00000	Quadratic
1 Dalapon	0.25000	0.28400	383084	0.001	-13.60089	15.00000	Quadratic
3 Dicamba	0.25000	0.27260	878536	0.001	-9.03960	15.00000	Quadratic
4 MCPP	50.00000	53.68835	1234	0.001	-7.37670	15.00000	Quadratic
5 MCPA	50.00000	51.36391	1893	0.001	-2.72783	15.00000	Quadratic
6 Dichlorprop	0.50000	0.54634	290356	0.001	-9.26877	15.00000	Quadratic
7 2,4-D	0.50000	0.54601	305262	0.001	-9.20294	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.13854	1354808	0.001	-10.83156	15.00000	Quadratic
10 2,4,5-T	0.12500	0.13688	1371176	0.001	-9.50187	15.00000	Quadratic
11 2,4-DB	0.50000	0.52682	186014	0.001	-5.36301	15.00000	Quadratic
12 Dinoseb	0.12500	0.13985	1207408	0.001	-11.87655	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i                      Injection Date: 26-FEB-2008 11:21  
Lab File ID: 077.D                         Init. Cal. Date(s): 18-NOV-2003    21-FEB-2008  
Analysis Type: WATER                      Init. Cal. Times:    10:47                      20:48  
Lab Sample ID: HSTD-CCV                   Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL	MIN	MAX	CURVE TYPE
\$ 2 DCAA	0.50000	0.52550	253930	0.001	-5.10032	15.00000 Quadratic
1 Dalapon	0.25000	0.27362	372140	0.001	-9.44858	15.00000 Quadratic
3 Dicamba	0.25000	0.25620	834684	0.001	-2.48109	15.00000 Quadratic
4 MCPP	50.00000	49.41464	1170	0.001	1.17072	15.00000 Quadratic
5 MCPA	50.00000	44.62263	1734	0.001	10.75473	15.00000 Quadratic
6 Dichlorprop	0.50000	0.50196	271866	0.001	-0.39223	15.00000 Quadratic
7 2,4-D	0.50000	0.51874	293078	0.001	-3.74731	15.00000 Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12844	1274112	0.001	-2.74906	15.00000 Quadratic
10 2,4,5-T	0.12500	0.12864	1300480	0.001	-2.91338	15.00000 Quadratic
11 2,4-DB	0.50000	0.48669	173928	0.001	2.66165	15.00000 Quadratic
12 Dinoseb	0.12500	0.12678	1096712	0.001	-1.42007	15.00000 Quadratic

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP2 ID: 0.42 (mm)

Calibration Time(s): 1704

2048

LAB FILE ID:

RF0.02: 006

RF0.04: 007

RF0.08: 008

RF0.2: 009

RF0.5: 010

RF0.7: 011

COMPOUND	RF0.02	RF0.04	RF0.08	RF0.2	RF0.5	RF0.7
=====	=====	=====	=====	=====	=====	=====
2,4-DB	4429	8316	15774	36286	80830	109256
Dicamba	9653	18320	36038	85536	195927	266691
Dichlorprop	8187	14910	28154	62007	133922	177222
Dalapon	4566	9433	16118	36897	81288	104733
Dinoseb	2094	7777	16880	46589	110909	159057
MCPA	10749	16922	27448	49512	89522	112269
MCPP	6622	10361	17168	31016	55789	70470
2,4,5-TP (Silvex)	5684	11127	23049	59599	147258	203220
2,4,5-T	6330	12148	24753	61099	146782	200264
2,4-D	13150	23359	43061	93050	201157	267861
=====	=====	=====	=====	=====	=====	=====
DCAA	7653	14328	26178	55097	116119	154115
=====	=====	=====	=====	=====	=====	=====

FORM VI HERB



FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/21/08 02/21/08

Column: RTX-CLP2 ID: 0.42 (mm)

Calibration Time(s): 1704 2048

RF1: 012

COMPOUND	RF1	CURVE	COEFFICENTS			%RSD OR R^2	MA
			A0	A1	A2		
=====	=====	=====	=====	=====	=====	=====	==
2,4-DB	149047	2ORDR	-8.53e-003	5.629e-006	7.697e-012	0.9999219	0
Dicamba	364266	2ORDR	-2.05e-003	1.163e-006	5.934e-013	0.9999696	0
Dichlorprop	236311	2ORDR	-9.11e-003	3.138e-006	4.815e-012	0.9999453	0
Dalapon	143839	2ORDR	-5.61e-003	2.749e-006	5.455e-012	0.9995201	0
Dinoseb	223767	2ORDR	1.848e-003	1.069e-006	1.739e-013	0.9997660	0
MCPA	142230	2ORDR	-2.6028993	3.368e-004	2.724e-009	0.9997388	0
MCPP	89670	2ORDR	-2.8035158	5.661e-004	6.533e-009	0.9995755	0
2,4,5-TP (Silvex)	281496	2ORDR	1.113e-003	7.94e-007	3.171e-013	0.9999785	0
2,4,5-T	273205	2ORDR	5.073e-004	7.71e-007	5.169e-013	0.9999833	0
2,4-D	355303	2ORDR	-1.07e-002	2.093e-006	2.116e-012	0.9999484	0
=====	=====	=====	=====	=====	=====	=====	==
DCAA	206441	2ORDR	-1.55e-002	3.715e-006	5.894e-012	0.9998071	0

FORM VI HERB

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i  
Lab File ID: 042.D  
Analysis Type: WATER  
Lab Sample ID: HSTD-CCV  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

Injection Date: 24-FEB-2008 10:49  
Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
Init. Cal. Times: 10:47 20:48  
Quant Type: ESTD

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
\$ 2 DCAA	0.50000	0.50662	236670	0.001	-1.32485	15.00000	Quadratic
1 Dalapon	0.25000	0.26306	335176	0.001	-5.22292	15.00000	Quadratic
3 Dicamba	0.25000	0.25417	799872	0.001	-1.66928	15.00000	Quadratic
4 MCPP	50.00000	47.66807	1093	0.001	4.66385	15.00000	Quadratic
5 MCPA	50.00000	51.24477	1835	0.001	-2.48954	15.00000	Quadratic
6 Dichlorprop	0.50000	0.50458	271014	0.001	-0.91575	15.00000	Quadratic
7 2,4-D	0.50000	0.47952	391116	0.001	4.09563	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12382	1168224	0.001	0.94184	15.00000	Quadratic
10 2,4,5-T	0.12500	0.11865	1120576	0.001	5.08372	15.00000	Quadratic
11 2,4-DB	0.50000	0.49537	161254	0.001	0.92692	15.00000	Quadratic
12 Dinoseb	0.12500	0.13953	1009328	0.001	-11.62198	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i                      Injection Date: 24-FEB-2008 22:14  
Lab File ID: 060.D                         Init. Cal. Date(s): 18-NOV-2003    21-FEB-2008  
Analysis Type: WATER                      Init. Cal. Times:    10:47                      20:48  
Lab Sample ID: HSTD-CCV                   Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL	MIN	RRF	%D / %DRIFT	MAX	%D / %DRIFT	CURVE TYPE
\$ 2 DCAA	0.50000	0.51087	238330	0.001	-2.17386	15.00000	Quadratic		
1 Dalapon	0.25000	0.26458	336836	0.001	-5.83142	15.00000	Quadratic		
3 Dicamba	0.25000	0.25506	802416	0.001	-2.02553	15.00000	Quadratic		
4 MCPP	50.00000	50.63049	1139	0.001	-1.26098	15.00000	Quadratic		
5 MCPA	50.00000	50.03380	1806	0.001	-0.06760	15.00000	Quadratic		
6 Dichlorprop	0.50000	0.51422	275344	0.001	-2.84426	15.00000	Quadratic		
7 2,4-D	0.50000	0.51958	418276	0.001	-3.91509	15.00000	Quadratic		
9 2,4,5-TP (Silvex)	0.12500	0.12956	1219832	0.001	-3.64438	15.00000	Quadratic		
10 2,4,5-T	0.12500	0.13334	1247760	0.001	-6.66846	15.00000	Quadratic		
11 2,4-DB	0.50000	0.51984	168350	0.001	-3.96764	15.00000	Quadratic		
12 Dinoseb	0.12500	0.13986	1011744	0.001	-11.89094	15.00000	Quadratic		

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i      Injection Date: 25-FEB-2008 03:48

Lab File ID: 069.D      Init. Cal. Date(s): 18-NOV-2003    21-FEB-2008

Analysis Type: WATER      Init. Cal. Times:    10:47      20:48

Lab Sample ID: HSTD-CCV      Quant Type:    ESTD

Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RF0.500	CCAL RF0.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
\$ 2 DCAA	0.50000	0.50723	236906	0.001	-1.44545	15.00000	Quadratic
1 Dalapon	0.25000	0.25955	331336	0.001	-3.81819	15.00000	Quadratic
3 Dicamba	0.25000	0.25329	797344	0.001	-1.31546	15.00000	Quadratic
4 MCPP	50.00000	50.43933	1136	0.001	-0.87866	15.00000	Quadratic
5 MCPA	50.00000	48.48593	1769	0.001	3.02814	15.00000	Quadratic
6 Dichlorprop	0.50000	0.50973	273328	0.001	-1.94524	15.00000	Quadratic
7 2,4-D	0.50000	0.51858	417610	0.001	-3.71679	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12883	1213336	0.001	-3.06594	15.00000	Quadratic
10 2,4,5-T	0.12500	0.13288	1243840	0.001	-6.30311	15.00000	Quadratic
11 2,4-DB	0.50000	0.51513	166990	0.001	-3.02656	15.00000	Quadratic
12 Dinoseb	0.12500	0.13905	1005904	0.001	-11.24085	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 26-FEB-2008 08:37  
 Lab File ID: 073.D Init. Cal. Date(s): 18-NOV-2003 21-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 20:48  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL RRFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
9 2 DCAA	0.50000	0.51011	238032	0.001	-2.02133	15.00000	Quadratic
1 Dalapon	0.25000	0.26716	339644	0.001	-6.86244	15.00000	Quadratic
13 Dicamba	0.25000	0.25492	802008	0.001	-1.96839	15.00000	Quadratic
4 MCPP	50.00000	46.82714	1080	0.001	6.34573	15.00000	Quadratic
5 MCPA	50.00000	55.40108	1933	0.001	-10.80216	15.00000	Quadratic
6 Dichlorprop	0.50000	0.51088	273848	0.001	-2.17695	15.00000	Quadratic
7 2,4-D	0.50000	0.49706	403076	0.001	0.58731	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12767	1202904	0.001	-2.13772	15.00000	Quadratic
10 2,4,5-T	0.12500	0.12640	1187960	0.001	-1.11672	15.00000	Quadratic
11 2,4-DB	0.50000	0.49605	161454	0.001	0.78950	15.00000	Quadratic
12 Dinoseb	0.12500	0.14025	1014512	0.001	-12.19912	15.00000	Quadratic

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i                      Injection Date: 26-FEB-2008 11:21  
Lab File ID: 077.D                         Init. Cal. Date(s): 18-NOV-2003    21-FEB-2008  
Analysis Type: WATER                      Init. Cal. Times:    10:47                      20:48  
Lab Sample ID: HSTD-CCV                   Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-5.i\080221.b\8151.m\8151.m

COMPOUND	RRF / AMOUNT	RFO.500	CCAL	MIN	MAX	CURVE TYPE
1\$ 2 DCAA	0.50000	0.51109	238418	0.001	-2.21891	15.00000 Quadratic
1 Dalapon	0.25000	0.26745	339960	0.001	-6.97860	15.00000 Quadratic
3 Dicamba	0.25000	0.25427	800152	0.001	-1.70848	15.00000 Quadratic
4 MCPP	50.00000	49.40591	1120	0.001	1.18818	15.00000 Quadratic
5 MCPA	50.00000	52.36002	1862	0.001	-4.72004	15.00000 Quadratic
6 Dichlorprop	0.50000	0.51000	273452	0.001	-2.00048	15.00000 Quadratic
7 2,4-D	0.50000	0.50608	409186	0.001	-1.21666	15.00000 Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12737	1200144	0.001	-1.89229	15.00000 Quadratic
10 2,4,5-T	0.12500	0.12858	1206872	0.001	-2.86749	15.00000 Quadratic
11 2,4-DB	0.50000	0.51083	165744	0.001	-2.16561	15.00000 Quadratic
12 Dinoseb	0.12500	0.14079	1018376	0.001	-12.62938	15.00000 Quadratic

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/20/08 02/20/08

Column: RTX-CLP

ID: 0.50

(mm)

Calibration Time(s): 1005

1423

LAB FILE ID:

RF0.02: 003

RF0.04: 004

RF0.08: 005

RF0.2: 006

RF0.5: 007

RF0.7: 008

COMPOUND	RF0.02	RF0.04	RF0.08	RF0.2	RF0.5	RF0.7
=====	=====	=====	=====	=====	=====	=====
2,4-DB	4344	8794	17462	40716	85133	117009
Dicamba	14158	26572	48515	105917	216597	285822
Dichlorprop	9941	18537	34113	72266	142847	185141
Dalapon	9008	14494	25127	49455	98192	124800
Dinoseb	9834	16257	47681	71116	148345	211119
MCPA	13177	21281	33318	59372	104287	126785
MCPP	5007	9586	16333	31407	57471	72830
2,4,5-TP (Silvex)	8334	15490	30193	73789	164438	216217
2,4,5-T	8092	15813	31498	75315	160991	216423
2,4-D	9175	17602	32253	68992	137373	181040
=====	=====	=====	=====	=====	=====	=====
DCAA	9955	18097	31804	64953	126708	165512
=====	=====	=====	=====	=====	=====	=====

FORM VI HERB

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/20/08 02/20/08

Column: RTX-CLP

ID: 0.50 (mm)

Calibration Time(s): 1005

1423

RF1: 009

COMPOUND	RF1	CURVE	COEFFICIENTS			%RSD OR R^2	MA
			A0	A1	A2		
=====	=====	=====	=====	=====	=====	=====	==
2,4-DB	157965	2ORDR	-8.69e-003	5.157e-006	7.844e-012	0.9994985	0
Dicamba	379173	2ORDR	-6.45e-003	9.421e-007	1.048e-012	0.9997568	0
Dichlorprop	242102	2ORDR	-1.23e-002	2.604e-006	6.579e-012	0.9997327	0
Dalapon	163082	2ORDR	-1.03e-002	1.912e-006	7.54e-012	0.9998022	0
Dinoseb	297176	2ORDR	-8.01e-003	8.385e-007	1.168e-013	0.9956516	0
MCPA	157684	2ORDR	-1.4641196	1.98e-004	2.84e-009	0.9998902	0
MCPP	93312	2ORDR	-1.8193174	5.482e-004	5.886e-009	0.9994967	0
2,4,5-TP (Silvex)	291194	2ORDR	-4.03e-004	6.408e-007	7.589e-013	0.9999323	0
2,4,5-T	292182	2ORDR	-1.37e-003	6.684e-007	6.642e-013	0.9997782	0
2,4-D	240643	2ORDR	-1.58e-002	2.967e-006	5.292e-012	0.9995202	0
=====	=====	=====	=====	=====	=====	=====	==
DCAA	217306	2ORDR	-1.97e-002	3.084e-006	7.489e-012	0.9995797	0

FORM VI HERB



e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i Injection Date: 20-FEB-2008 22:27  
 Lab File ID: 022.D Init. Cal. Date(s): 18-NOV-2003 20-FEB-2008  
 Analysis Type: WATER Init. Cal. Times: 10:47 14:23  
 Lab Sample ID: HSTD-CCV Quant Type: ESTD  
 Method: \\Nitro\chem\ECD-5.i\080220.b\8151.m

COMPOUND	RRF / AMOUNT	REF0.500	CCAL RRF0.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
9 2 DCAA	0.50000	0.46425	242456	0.001	7.14927	15.00000	Quadratic
1 Dalapon	0.25000	0.21413	349196	0.001	14.34901	15.00000	Quadratic
3 Dicamba	0.25000	0.22572	805328	0.001	9.71137	15.00000	Quadratic
4 MCPP	50.00000	48.52315	1140	0.001	2.95371	15.00000	Quadratic
5 MCPA	50.00000	43.68319	1919	0.001	12.63362	15.00000	Quadratic
6 Dichlorprop	0.50000	0.47478	277088	0.001	5.04378	15.00000	Quadratic
7 2,4-D	0.50000	0.53877	295836	0.001	-7.75424	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.11636	1232744	0.001	6.91301	15.00000	Quadratic
10 2,4,5-T	0.12500	0.12333	1286832	0.001	1.33745	15.00000	Quadratic
11 2,4-DB	0.50000	0.52198	180924	0.001	-4.39605	15.00000	Quadratic
12 Dinoseb	0.12500	0.11028	1107208	0.001	11.77950	15.00000	Quadratic

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/20/08 02/20/08

Column: RTX-CLP2 ID: 0.42 (mm)

Calibration Time(s): 1005

1423

LAB FILE ID:

RF0.02: 003

RF0.04: 004

RF0.08: 005

RF0.2: 006

RF0.5: 007

RF0.7: 008

COMPOUND	RF0.02	RF0.04	RF0.08	RF0.2	RF0.5	RF0.7
2,4-DB	4016	7784	15499	35531	77379	106054
Dicamba	9936	18717	36516	85451	192243	263076
Dichlorprop	8169	15130	28177	61789	131162	174820
Dalapon	5096	9331	17860	38286	82435	108606
Dinoseb	5522	10867	21797	53694	123293	168749
MCPA	10631	17155	28647	52473	94412	118102
MCPP	5120	8530	14595	27486	50185	64575
2,4,5-TP (Silvex)	5703	11260	23197	59713	143122	200345
2,4,5-T	5780	11595	24240	59535	139308	194480
2,4-D	12184	22631	41664	90712	192536	258807
DCAA	8314	14719	26565	55609	113752	152331

FORM VI HERB

FORM 6  
HERB INITIAL CALIBRATION DATA

Lab Name: E-LAB

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: SDGA00270

Instrument ID: ECD-5

Calibration Date(s): 02/20/08 02/20/08

Column: RTX-CLP2 ID: 0.42 (mm), Calibration Time(s): 1005 1423

RF1: 009

COMPOUND	RF1	CURVE	COEFFICENTS			%RSD OR R^2	MA
			A0	A1	A2		
=====	=====	=====	=====	=====	=====	=====	==
2,4-DB	145508	2ORDR	-9.63e-003	5.958e-006	6.833e-012	0.9997271	0
Dicamba	361927	2ORDR	-3.74e-003	1.211e-006	5.046e-013	0.9998970	0
Dichlorprop	234933	2ORDR	-1.26e-002	3.304e-006	4.327e-012	0.9998291	0
Dalapon	145303	2ORDR	-5.42e-003	2.568e-006	6.32e-012	0.9998980	0
Dinoseb	232858	2ORDR	-6.58e-004	9.395e-007	5.929e-013	0.9999376	0
MCPA	149872	2ORDR	-2.2566477	3.105e-004	2.504e-009	0.9996617	0
MCPP	85895	2ORDR	-3.6758722	8.118e-004	4.732e-009	0.9985364	0
2,4,5-TP (Silvex)	279320	2ORDR	3.67e-004	8.315e-007	2.206e-013	0.9999505	0
2,4,5-T	269859	2ORDR	-3.2e-004	8.482e-007	2.933e-013	0.9999131	0
2,4-D	352273	2ORDR	-1.6e-002	2.359e-006	1.516e-012	0.9997193	0
=====	=====	=====	=====	=====	=====	=====	==
DCAA	204378	2ORDR	-2.02e-002	3.857e-006	5.624e-012	0.9996203	0
=====	=====	=====	=====	=====	=====	=====	==

FORM VI HERB

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-5.i      Injection Date: 20-FEB-2008 22:27  
Lab File ID: 022.D      Init. Cal. Date(s): 18-NOV-2003 20-FEB-2008  
Analysis Type: WATER      Init. Cal. Times: 10:47 14:23  
Lab Sample ID: HSTD-CCV      Quant Type: ESTD  
Method: \\Nitro\chem\ECD-5.i\080220.b\8151.m\8151.m

COMPOUND	CCAL		MIN		MAX		CURVE TYPE
	RRF / AMOUNT	RFO.500	RRFO.500	RRF	%D / %DRIFT	%D / %DRIFT	
9 2 DCAA	0.50000	0.50748	233784	0.001	-1.49512	15.00000	Quadratic
1 Dalapon	0.25000	0.24832	328736	0.001	0.67013	15.00000	Quadratic
3 Dicamba	0.25000	0.25234	782196	0.001	-0.93429	15.00000	Quadratic
4 MCPP	50.00000	53.94852	1080	0.001	-7.89705	15.00000	Quadratic
5 MCPA	50.00000	43.77933	1742	0.001	12.44134	15.00000	Quadratic
6 Dichlorprop	0.50000	0.50663	267462	0.001	-1.32602	15.00000	Quadratic
7 2,4-D	0.50000	0.52414	405204	0.001	-4.82882	15.00000	Quadratic
9 2,4,5-TP (Silvex)	0.12500	0.12837	1184976	0.001	-2.69900	15.00000	Quadratic
10 2,4,5-T	0.12500	0.13351	1199960	0.001	-6.80781	15.00000	Quadratic
11 2,4-DB	0.50000	0.53161	165902	0.001	-6.32221	15.00000	Quadratic
12 Dinoseb	0.12500	0.12887	1020728	0.001	-3.09549	15.00000	Quadratic

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuarez  
 Curve Type : Average

## Calibration File Names:

Level 1: \\Nitro\chem\ECD-7.i\080225.b\008.D  
 Level 2: \\Nitro\chem\ECD-7.i\080225.b\009.D  
 Level 3: \\Nitro\chem\ECD-7.i\080225.b\010.D  
 Level 4: \\Nitro\chem\ECD-7.i\080225.b\011.D  
 Level 5: \\Nitro\chem\ECD-7.i\080225.b\012.D  
 Level 6: \\Nitro\chem\ECD-7.i\080225.b\013.D

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
Level 1	Level 2	Level 3	Level 4	Level 5	Level 6				
24 Aroclor-1016(1)	158840	159210	146484	133258	127241	123063	141349	11.187	
(2)	310860	291860	260992	235770	224535	216610	256771	14.848	
(3)	408820	386270	334092	310422	300047	292621	338712	14.231	
(4)	293400	278730	252684	230108	219207	211584	247619	13.396	
(5)	229680	214740	190444	172898	163516	156677	187993	15.539	
25 Aroclor-1221(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
26 Aroclor-1232(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
27 Aroclor-1242(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
28 Aroclor-1248(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
29 Aroclor-1254(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuares  
 Curve Type : Average

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
Level 1	Level 2	Level 3	Level 4	Level 5	Level 6				
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
30 Aroclor-1260(1)	435960	398870	352160	317264	304503	297008	350961	15.980	
(2)	662140	594040	528220	479210	464583	454213	530401	15.585	
(3)	338000	311930	278716	250210	239115	233383	275226	15.399	
(4)	393520	363710	328700	295740	284957	280092	324453	14.246	
(5)	800000	720480	655308	600802	587904	582351	657808	13.250	
41 Aroclor-1268(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
\$ 1 Tetrachloro-m-Xylene	8170200	7632900	7121200	6786120	6713173	6662370	7180994	8.425	
\$ 33 Decachlorobiphenyl (DCB)	7602000	6638300	6236720	5612620	5363707	5408550	6143649	14.210	

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i                    Injection Date: 26-FEB-2008 09:15  
Lab File ID: 034.D                      Init. Cal. Date(s): 25-FEB-2008    25-FEB-2008  
Analysis Type: WATER                    Init. Cal. Times:    18:27            21:18  
Lab Sample ID: AR1660-CCV              Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m

COMPOUND	RRF / AMOUNT	RFO.500	MIN		MAX		CURVE TYPE
			RRF	%D / %DRIFT	%D / %DRIFT		
\$ 1 Tetrachloro-m-Xylene	7180994	7034200	0.010	2.04420	15.00000	Averaged	
24 Aroclor-1016(1)	141349	147488	0.010	-4.34286	15.00000	Averaged	
(2)	256771	263304	0.010	-2.54425	15.00000	Averaged	
(3)	338712	341120	0.010	-0.71094	15.00000	Averaged	
(4)	247619	250792	0.010	-1.28149	15.00000	Averaged	
(5)	187993	189168	0.010	-0.62529	15.00000	Averaged	
30 Aroclor-1260(1)	350961	352584	0.010	-0.46251	15.00000	Averaged	
(2)	530401	525912	0.010	0.84633	15.00000	Averaged	
(3)	275226	279064	0.010	-1.39463	15.00000	Averaged	
(4)	324453	329316	0.010	-1.49876	15.00000	Averaged	
(5)	657808	654848	0.010	0.44990	15.00000	Averaged	
\$ 33 Decachlorobiphenyl (DCB)	6143649	6148040	0.010	-0.07146	15.00000	Averaged	

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i                      Injection Date: 26-FEB-2008 20:03  
Lab File ID: 053.D                         Init. Cal. Date(s): 25-FEB-2008    25-FEB-2008  
Analysis Type: WATER                      Init. Cal. Times:    18:27                      21:18  
Lab Sample ID: AR1660-CCV                Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m

COMPOUND	RRF / AMOUNT	RFO.500	MIN RRF	%D / %DRIFT	MAX %D / %DRIFT	CURVE TYPE
\$ 1 Tetrachloro-m-Xylene	7180994	7195880	0.010	-0.20730	15.00000	Averaged
24 Aroclor-1016(1)	141349	149932	0.010	-6.07191	15.00000	Averaged
(2)	256771	267300	0.010	-4.10050	15.00000	Averaged
(3)	338712	341460	0.010	-0.81133	15.00000	Averaged
(4)	247619	252168	0.010	-1.83719	15.00000	Averaged
(5)	187993	192216	0.010	-2.24663	15.00000	Averaged
30 Aroclor-1260(1)	350961	361564	0.010	-3.02120	15.00000	Averaged
(2)	530401	539064	0.010	-1.63330	15.00000	Averaged
(3)	275226	286664	0.010	-4.15600	15.00000	Averaged
(4)	324453	336916	0.010	-3.84116	15.00000	Averaged
(5)	657808	671424	0.010	-2.06998	15.00000	Averaged
\$ 33 Decachlorobiphenyl (DCB)	6143649	6398480	0.010	-4.14787	15.00000	Averaged



## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuares  
 Curve Type : Average

## Calibration File Names:

Level 1: \\Nitro\chem\ECD-7.i\080225.b\080225.b\008.D  
 Level 2: \\Nitro\chem\ECD-7.i\080225.b\080225.b\009.D  
 Level 3: \\Nitro\chem\ECD-7.i\080225.b\080225.b\010.D  
 Level 4: \\Nitro\chem\ECD-7.i\080225.b\080225.b\011.D  
 Level 5: \\Nitro\chem\ECD-7.i\080225.b\080225.b\012.D  
 Level 6: \\Nitro\chem\ECD-7.i\080225.b\080225.b\013.D

	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
Compound	Level 1	Level 2	Level 3	Level 4	Level 5	Level 6			
24 Aroclor-1016(1)	188840	173810	160312	151714	148364	143570	161102	10.713	
(2)	389440	365910	331688	304708	293963	285983	328615	12.686	
(3)	495640	471650	418528	394776	391996	380247	425473	11.130	
(4)	346180	342590	296512	269896	259909	257690	295463	13.655	
(5)	279820	264950	236324	218764	210175	204070	235684	13.066	
25 Aroclor-1221(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
26 Aroclor-1232(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
27 Aroclor-1242(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
28 Aroclor-1248(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
29 Aroclor-1254(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 25-FEB-2008 18:27  
 End Cal Date : 25-FEB-2008 21:18  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m  
 Last Edit : 27-Feb-2008 18:56 jjuares  
 Curve Type : Average

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
Level 1	Level 2	Level 3	Level 4	Level 5	Level 6				
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
30 Aroclor-1260(1)	567080	523680	461776	423508	411521	399843	464568	14.504	
(2)	664040	607800	538796	501720	490820	478908	547014	13.510	
(3)	437600	407420	360736	334666	324281	318156	363810	13.383	
(4)	473600	429170	392640	363974	355959	348920	394044	12.410	
(5)	976180	895200	839180	787730	780368	775746	842401	9.493	
41 Aroclor-1268(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
\$ 1 Tetrachloro-m-Xylene	8765400	8524000	8383480	8206820	8182640	8157320	8369943	2.863	
\$ 33 Decachlorobiphenyl (DCB)	9036200	8137400	7697400	6931260	6726533	6806400	7555866	12.114	

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i  
Lab File ID: 034.D  
Analysis Type: WATER  
Lab Sample ID: AR1660-CCV  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m

Injection Date: 26-FEB-2008 09:15  
Init. Cal. Date(s): 25-FEB-2008 25-FEB-2008  
Init. Cal. Times: 18:27 21:18  
Quant Type: ESTD

				MIN		MAX		
COMPOUND		RRF / AMOUNT	RFO.500	RRF	%D / %DRIFT	%D / %DRIFT	CURVE TYPE	
\$ 1 Tetrachloro-m-Xylene		8369943	7717080	0.010	7.80009	15.00000	Averaged	
24 Aroclor-1016(1)		161102	152524	0.010	5.32438	15.00000	Averaged	
	(2)	328615	312224	0.010	4.98798	15.00000	Averaged	
	(3)	425473	405392	0.010	4.71965	15.00000	Averaged	
	(4)	295463	282664	0.010	4.33181	15.00000	Averaged	
	(5)	235684	229000	0.010	2.83591	15.00000	Averaged	
30 Aroclor-1260(1)		464568	439964	0.010	5.29611	15.00000	Averaged	
	(2)	547014	516992	0.010	5.48834	15.00000	Averaged	
	(3)	363810	346632	0.010	4.72167	15.00000	Averaged	
	(4)	394044	373140	0.010	5.30494	15.00000	Averaged	
	(5)	842401	790092	0.010	6.20948	15.00000	Averaged	
\$ 33 Decachlorobiphenyl (DCB)		7555866	7187520	0.010	4.87496	15.00000	Averaged	

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i                      Injection Date: 26-FEB-2008 20:03  
Lab File ID: 053.D                         Init. Cal. Date(s): 25-FEB-2008    25-FEB-2008  
Analysis Type: WATER                      Init. Cal. Times:    18:27            21:18  
Lab Sample ID: AR1660-CCV                Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-7.i\080225.b\8082.m\8082.m

COMPOUND	RRF / AMOUNT	MIN		MAX		CURVE TYPE
		RFO.500	RRF	%D / %DRIFT	%D / %DRIFT	
\$ 1 Tetrachloro-m-Xylene	8369943	7609760	0.010	9.08230	15.00000	Averaged
24 Aroclor-1016(1)	161102	152096	0.010	5.59005	15.00000	Averaged
(2)	328615	309240	0.010	5.89604	15.00000	Averaged
(3)	425473	395192	0.010	7.11698	15.00000	Averaged
(4)	295463	278164	0.010	5.85484	15.00000	Averaged
(5)	235684	226188	0.010	4.02903	15.00000	Averaged
30 Aroclor-1260(1)	464568	437796	0.010	5.76278	15.00000	Averaged
(2)	547014	511096	0.010	6.56619	15.00000	Averaged
(3)	363810	345776	0.010	4.95695	15.00000	Averaged
(4)	394044	372612	0.010	5.43893	15.00000	Averaged
(5)	842401	788956	0.010	6.34433	15.00000	Averaged
\$ 33 Decachlorobiphenyl (DCB)	7555866	7272560	0.010	3.74948	15.00000	Averaged

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 18-FEB-2008 15:08  
 End Cal Date : 18-FEB-2008 20:49  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080218.b\8082.m  
 Last Edit : 29-Feb-2008 09:17 jjuares  
 Curve Type : Average

## Calibration File Names:

Level 1: \\Nitro\chem\ECD-7.i\080218.b\011.D  
 Level 2: \\Nitro\chem\ECD-7.i\080218.b\012.D  
 Level 3: \\Nitro\chem\ECD-7.i\080218.b\013.D  
 Level 4: \\Nitro\chem\ECD-7.i\080218.b\014.D  
 Level 5: \\Nitro\chem\ECD-7.i\080218.b\015.D  
 Level 6: \\Nitro\chem\ECD-7.i\080218.b\016.D

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD
-----	-----	-----	-----	-----	-----	-----	-----	-----
24 Aroclor-1016(1)	160140	164720	152156	136138	129521	126809	144914	11.205
(2)	315380	304320	271460	240310	227909	223382	263794	15.006
(3)	416520	390230	351704	317350	305632	302988	347404	13.654
(4)	289200	289980	264996	235266	224160	220614	254036	12.461
(5)	229540	224200	199012	176198	167103	163220	193212	14.972
25 Aroclor-1221(1)	+++++	+++++	53120	+++++	+++++	+++++	53120	0.000 <-
(2)	+++++	+++++	74692	+++++	+++++	+++++	74692	0.000 <-
(3)	+++++	+++++	48912	+++++	+++++	+++++	48912	0.000 <-
(4)	+++++	+++++	175556	+++++	+++++	+++++	175556	0.000 <-
(5)	+++++	+++++	20988	+++++	+++++	+++++	20988	0.000 <-
26 Aroclor-1232(1)	+++++	+++++	55384	+++++	+++++	+++++	55384	0.000 <-
(2)	+++++	+++++	164280	+++++	+++++	+++++	164280	0.000 <-
(3)	+++++	+++++	124404	+++++	+++++	+++++	124404	0.000 <-
(4)	+++++	+++++	51968	+++++	+++++	+++++	51968	0.000 <-
(5)	+++++	+++++	156164	+++++	+++++	+++++	156164	0.000 <-
27 Aroclor-1242(1)	+++++	+++++	304764	+++++	+++++	+++++	304764	0.000 <-
(2)	+++++	+++++	379432	+++++	+++++	+++++	379432	0.000 <-
(3)	+++++	+++++	184136	+++++	+++++	+++++	184136	0.000 <-
(4)	+++++	+++++	224800	+++++	+++++	+++++	224800	0.000 <-
(5)	+++++	+++++	227828	+++++	+++++	+++++	227828	0.000 <-
28 Aroclor-1248(1)	+++++	+++++	179504	+++++	+++++	+++++	179504	0.000 <-
(2)	+++++	+++++	253776	+++++	+++++	+++++	253776	0.000 <-
(3)	+++++	+++++	278160	+++++	+++++	+++++	278160	0.000 <-
(4)	+++++	+++++	242100	+++++	+++++	+++++	242100	0.000 <-
(5)	+++++	+++++	158816	+++++	+++++	+++++	158816	0.000 <-
29 Aroclor-1254(1)	+++++	+++++	273692	+++++	+++++	+++++	273692	0.000 <-
(2)	+++++	+++++	364576	+++++	+++++	+++++	364576	0.000 <-
(3)	+++++	+++++	496472	+++++	+++++	+++++	496472	0.000 <-

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 18-FEB-2008 15:08  
 End Cal Date : 18-FEB-2008 20:49  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080218.b\8082.m  
 Last Edit : 29-Feb-2008 09:17 jjuares  
 Curve Type : Average

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
Level 1	Level 2	Level 3	Level 4	Level 5	Level 6				
(4)	+++++	+++++	374224	+++++	+++++	+++++	374224	0.000	<-
(5)	+++++	+++++	342056	+++++	+++++	+++++	342056	0.000	<-
30 Aroclor-1260(1)	444020	415590	366204	322352	307229	303302	359783	16.493	
(2)	662740	612050	542748	482264	465219	463315	538056	15.560	
(3)	330000	319100	286176	251298	238995	235628	276866	14.876	
(4)	384880	375680	338500	298768	287689	284773	328382	13.596	
(5)	779420	737240	666628	597606	585185	594914	660166	12.491	
41 Aroclor-1268(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
\$ 1 Tetrachloro-m-Xylene	8157000	7840100	7348000	6877700	6762960	6831970	7302955	8.018	
\$ 33 Decachlorobiphenyl (DCB)	7695000	7269400	6610800	5783060	5729560	5904360	6498697	12.864	

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i                      Injection Date: 19-FEB-2008 12:42  
Lab File ID: 036.D                          Init. Cal. Date(s): 18-FEB-2008    18-FEB-2008  
Analysis Type: WATER                      Init. Cal. Times:    15:08                      20:49  
Lab Sample ID: AR1660-CCV                Quant Type:    ESTD  
Method: \\Nitro\chem\ECD-7.i\080218.b\8082.m

COMPOUND	RRF / AMOUNT	RFO.500	MIN		MAX		CURVE TYPE
			RRF	%D / %DRIFT	%D / %DRIFT		
\$ 1 Tetrachloro-m-Xylene	7302955	6998400	0.010	4.17030	15.00000	Averaged	
24 Aroclor-1016(1)	144914	147508	0.010	-1.78999	15.00000	Averaged	
(2)	263794	261412	0.010	0.90281	15.00000	Averaged	
(3)	347404	336692	0.010	3.08344	15.00000	Averaged	
(4)	254036	249120	0.010	1.93516	15.00000	Averaged	
(5)	193212	191904	0.010	0.67703	15.00000	Averaged	
30 Aroclor-1260(1)	359783	353904	0.010	1.63401	15.00000	Averaged	
(2)	538056	524500	0.010	2.51943	15.00000	Averaged	
(3)	276866	277168	0.010	-0.10904	15.00000	Averaged	
(4)	328382	327284	0.010	0.33428	15.00000	Averaged	
(5)	660166	644812	0.010	2.32571	15.00000	Averaged	
\$ 33 Decachlorobiphenyl (DCB)	6498697	6356160	0.010	2.19331	15.00000	Averaged	

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i      Injection Date: 19-FEB-2008 23:19

Lab File ID: 052.D      Init. Cal. Date(s): 18-FEB-2008    18-FEB-2008

Analysis Type: WATER      Init. Cal. Times:    15:08      20:49

Lab Sample ID: AR1660-CCV    Quant Type:    ESTD

Method: \\Nitro\chem\ECD-7.i\080218.b\8082.m

COMPOUND	RRF / AMOUNT	RFO.500	MIN		MAX		CURVE TYPE
			RRF	%D / %DRIFT	%D / %DRIFT		
\$ 1 Tetrachloro-m-Xylene	7302955	7384680	0.010	-1.11907	15.00000	Averaged	
24 Aroclor-1016(1)	144914	148624	0.010	-2.56010	15.00000	Averaged	
(2)	263794	271304	0.010	-2.84709	15.00000	Averaged	
(3)	347404	351936	0.010	-1.30453	15.00000	Averaged	
(4)	254036	264608	0.010	-4.16161	15.00000	Averaged	
(5)	193212	198060	0.010	-2.50910	15.00000	Averaged	
30 Aroclor-1260(1)	359783	366736	0.010	-1.93259	15.00000	Averaged	
(2)	538056	548880	0.010	-2.01170	15.00000	Averaged	
(3)	276866	287528	0.010	-3.85092	15.00000	Averaged	
(4)	328382	336636	0.010	-2.51362	15.00000	Averaged	
(5)	660166	668216	0.010	-1.21946	15.00000	Averaged	
\$ 33 Decachlorobiphenyl (DCB)	6498697	6418920	0.010	1.22758	15.00000	Averaged	



## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 18-FEB-2008 15:08  
 End Cal Date : 18-FEB-2008 20:49  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080218.b\8082.m\8082.m  
 Last Edit : 21-Feb-2008 11:53 jjuarez  
 Curve Type : Average

## Calibration File Names:

Level 1: \\Nitro\chem\ECD-7.i\080218.b\080218.b\011.D  
 Level 2: \\Nitro\chem\ECD-7.i\080218.b\080218.b\012.D  
 Level 3: \\Nitro\chem\ECD-7.i\080218.b\080218.b\013.D  
 Level 4: \\Nitro\chem\ECD-7.i\080218.b\080218.b\014.D  
 Level 5: \\Nitro\chem\ECD-7.i\080218.b\080218.b\015.D  
 Level 6: \\Nitro\chem\ECD-7.i\080218.b\080218.b\016.D

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD
-----	-----	-----	-----	-----	-----	-----	-----	-----
24 Aroclor-1016(1)	168480	153890	144000	129380	124537	124145	140739	12.790
(2)	346880	321590	290028	259948	248484	247588	285753	14.472
(3)	433020	403960	368312	347470	337732	348044	373090	10.101
(4)	301240	282350	260460	235616	225571	225417	255109	12.436
(5)	243060	234020	208568	188740	180920	176819	205355	13.672
25 Aroclor-1221(1)	+++++	+++++	46056	+++++	+++++	+++++	46056	0.000 <-
(2)	+++++	+++++	74816	+++++	+++++	+++++	74816	0.000 <-
(3)	+++++	+++++	51236	+++++	+++++	+++++	51236	0.000 <-
(4)	+++++	+++++	177072	+++++	+++++	+++++	177072	0.000 <-
(5)	+++++	+++++	26692	+++++	+++++	+++++	26692	0.000 <-
26 Aroclor-1232(1)	+++++	+++++	55756	+++++	+++++	+++++	55756	0.000 <-
(2)	+++++	+++++	162064	+++++	+++++	+++++	162064	0.000 <-
(3)	+++++	+++++	139772	+++++	+++++	+++++	139772	0.000 <-
(4)	+++++	+++++	51280	+++++	+++++	+++++	51280	0.000 <-
(5)	+++++	+++++	264540	+++++	+++++	+++++	264540	0.000 <-
27 Aroclor-1242(1)	+++++	+++++	326304	+++++	+++++	+++++	326304	0.000 <-
(2)	+++++	+++++	687112	+++++	+++++	+++++	687112	0.000 <-
(3)	+++++	+++++	187980	+++++	+++++	+++++	187980	0.000 <-
(4)	+++++	+++++	251644	+++++	+++++	+++++	251644	0.000 <-
(5)	+++++	+++++	281428	+++++	+++++	+++++	281428	0.000 <-
28 Aroclor-1248(1)	+++++	+++++	203296	+++++	+++++	+++++	203296	0.000 <-
(2)	+++++	+++++	267968	+++++	+++++	+++++	267968	0.000 <-
(3)	+++++	+++++	349796	+++++	+++++	+++++	349796	0.000 <-
(4)	+++++	+++++	163820	+++++	+++++	+++++	163820	0.000 <-
(5)	+++++	+++++	123040	+++++	+++++	+++++	123040	0.000 <-
29 Aroclor-1254(1)	+++++	+++++	343716	+++++	+++++	+++++	343716	0.000 <-
(2)	+++++	+++++	382476	+++++	+++++	+++++	382476	0.000 <-
(3)	+++++	+++++	532440	+++++	+++++	+++++	532440	0.000 <-

## e-Lab Analytical, Inc.

## INITIAL CALIBRATION DATA

Start Cal Date : 18-FEB-2008 15:08  
 End Cal Date : 18-FEB-2008 20:49  
 Quant Method : ESTD  
 Origin : Disabled  
 Target Version : 4.14  
 Integrator : Falcon  
 Method file : \\Nitro\chem\ECD-7.i\080218.b\8082.m\8082.m  
 Last Edit : 21-Feb-2008 11:53 jjuares  
 Curve Type : Average

Compound	0.10000	0.20000	0.50000	1.000	1.500	2.000	RRF	% RSD	
Level 1	Level 2	Level 3	Level 4	Level 5	Level 6				
(4)	+++++	+++++	387448	+++++	+++++	+++++	387448	0.000	<-
(5)	+++++	+++++	243648	+++++	+++++	+++++	243648	0.000	<-
30 Aroclor-1260(1)	494500	449000	399484	358658	344169	344176	398331	15.580	
(2)	572660	523550	465640	421478	407088	412487	467151	14.518	
(3)	374520	349510	312812	279196	270461	270853	309559	14.284	
(4)	391640	369430	335936	302326	295753	298087	332195	12.278	
(5)	782300	765400	712284	652406	653440	677203	707172	7.961	
41 Aroclor-1268(1)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(2)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(3)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(4)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
(5)	+++++	+++++	+++++	+++++	+++++	+++++	+++++	+++++	<-
\$ 1 Tetrachloro-m-Xylene	7287800	7154400	7047920	6771640	6779853	7019350	7010161	2.919	
\$ 33 Decachlorobiphenyl (DCB)	7582200	7377500	6806080	6106560	6083600	6316260	6712033	9.717	

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i  
Lab File ID: 036.D  
Analysis Type: WATER  
Lab Sample ID: AR1660-CCV  
Method: \\Nitro\chem\ECD-7.i\080218.b\8082.m\8082.m

Injection Date: 19-FEB-2008 12:42  
Init. Cal. Date(s): 18-FEB-2008 18-FEB-2008  
Init. Cal. Times: 15:08 20:49  
Quant Type: ESTD

COMPOUND	RRF / AMOUNT	RFO.500	MIN		MAX		CURVE TYPE
			RRF	%D / %DRIFT	%D / %DRIFT		
\$ 1 Tetrachloro-m-Xylene	7010161	6688440	0.010	4.58935	15.00000		Averaged
24 Aroclor-1016(1)	140739	137468	0.010	2.32397	15.00000		Averaged
(2)	285753	279664	0.010	2.13086	15.00000		Averaged
(3)	373090	355564	0.010	4.69744	15.00000		Averaged
(4)	255109	256688	0.010	-0.61897	15.00000		Averaged
(5)	205355	199424	0.010	2.88793	15.00000		Averaged
30 Aroclor-1260(1)	398331	390820	0.010	1.88567	15.00000		Averaged
(2)	467151	452204	0.010	3.19950	15.00000		Averaged
(3)	309559	304912	0.010	1.50108	15.00000		Averaged
(4)	332195	327360	0.010	1.45559	15.00000		Averaged
(5)	707172	688272	0.010	2.67264	15.00000		Averaged
\$ 33 Decachlorobiphenyl (DCB)	6712033	6615920	0.010	1.43196	15.00000		Averaged

e-Lab Analytical, Inc.

CONTINUING CALIBRATION COMPOUNDS

Instrument ID: ECD-7.i      Injection Date: 19-FEB-2008 23:19

Lab File ID: 052.D      Init. Cal. Date(s): 18-FEB-2008    18-FEB-2008

Analysis Type: WATER      Init. Cal. Times:    15:08      20:49

Lab Sample ID: AR1660-CCV    Quant Type: ESTD

Method: \\Nitro\chem\ECD-7.i\080218.b\8082.m\8082.m

			MIN		MAX	
COMPOUND	RRF / AMOUNT	RF0.500	RRF	%D / %DRIFT	%D / %DRIFT	CURVE TYPE
\$ 1 Tetrachloro-m-Xylene	7010161	6904040	0.010	1.51381	15.00000	Averaged
24 Aroclor-1016(1)	140739	143980	0.010	-2.30305	15.00000	Averaged
(2)	285753	286764	0.010	-0.35380	15.00000	Averaged
(3)	373090	368684	0.010	1.18086	15.00000	Averaged
(4)	255109	251072	0.010	1.58244	15.00000	Averaged
(5)	205355	206880	0.010	-0.74286	15.00000	Averaged
30 Aroclor-1260(1)	398331	400148	0.010	-0.45610	15.00000	Averaged
(2)	467151	466092	0.010	0.22659	15.00000	Averaged
(3)	309559	313040	0.010	-1.12459	15.00000	Averaged
(4)	332195	336332	0.010	-1.24523	15.00000	Averaged
(5)	707172	711968	0.010	-0.67817	15.00000	Averaged
\$ 33 Decachlorobiphenyl (DCB)	6712033	6630440	0.010	1.21563	15.00000	Averaged

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802300

Instrument ID: FID-2

Calibration Date(s): 02/18/08 02/19/08

Column:

ID: 2.00 (mm)

Calibration Time(s): 1455

0655

LAB FILE ID:

RF10: 016

RF50: 017

RF100: 018

RF250: 019

RF500: 020

COMPOUND	RF10	RF50	RF100	RF250	RF500
TPH-ORO (>C28-C35)	2410.000	1820.860	1920.020	1804.828	1577.508
TPH-DRO (>C10-C28)	2410.000	1820.860	1920.020	1804.828	1577.508
TPH-GRO (C6-C10)	2074.300	1871.040	1309.020	1221.916	1096.358
2-Fluorobiphenyl	1088.600	1268.100	1149.840	1445.700	1377.340

FORM VI TPH

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802300

Instrument ID: FID-2

Calibration Date(s): 02/18/08 02/19/08

Column:

ID: 2.00 (mm)

Calibration Time(s): 1455

0655

LAB FILE ID:

RF1000: 021

RF2000: 008

COMPOUND	RF1000	RF2000
TPH-ORO (>C28-C35)	1683.375	1825.634
TPH-DRO (>C10-C28)	1683.375	1825.634
TPH-GRO (C6-C10)	1088.556	1061.624
2-Fluorobiphenyl	1316.250	

FORM VI TPH

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: FID-2 Calibration Date(s): 02/18/08 02/19/08

Column: ID: 2.00 (mm) Calibration Time(s): 1455 0655

COMPOUND	CURVE	COEFFICIENTS		%RSD OR R^2
		A0	A1	
TPH-ORO (>C28-C35)	AVRG		1863.17507	14.2
TPH-DRO (>C10-C28)	AVRG		1863.17507	14.2
TPH-GRO (C6-C10)	LINR	-28.205917	9.529e-004	1.000
2-Fluorobiphenyl	AVRG		1274.30500	10.6

FORM VI TPH

FORM 7  
TPH CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: FID-2 Calibration Date: 02/21/08 Time: 2134

Lab File ID: 037 Init. Calib. Date(s): 02/18/08 02/19/08

Init. Calib. Times: 1455 0655

GC Column: \_\_\_\_\_ ID: 2.00 (mm)

COMPOUND	SAMPLE AMOUNT	CAL100 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
C6-C12	236.170	250.000	LINR	5.5	25.0
>C12-C28	236.860	250.000	AVRG	5.2	25.0
<del>C28-C35</del>	<del>0.000</del>	<del>250.000</del>	<del>AVRG</del>	<del>100.0</del>	<del>25.0</del>
=====	=====	=====	=====	=====	=====
Trifluoromethyl benzene	48.387	50.000	AVRG	3.2	25.0
2-Fluorobiphenyl	52.671	50.000	AVRG	5.3	25.0

FORM VII TPH



FORM 7  
TPH CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: FID-2 Calibration Date: 02/22/08 Time: 1327

Lab File ID: 056 Init. Calib. Date(s): 02/18/08 02/19/08

Init. Calib. Times: 1455 0655

GC Column: ID: 2.00 (mm)

COMPOUND	SAMPLE AMOUNT	CAL100 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
C6-C12	273.834	250.000	LINR	9.5	25.0
>C12-C28	294.192	250.000	AVRG	17.7	25.0
<del>C28-C35</del>	<del>0.000</del>	<del>250.000</del>	<del>AVRG</del>	<del>100.0</del>	<del>25.0</del>
=====	=====	=====	=====	=====	=====
Trifluoromethyl benzene	52.548	50.000	AVRG	5.1	25.0
2-Fluorobiphenyl	58.362	50.000	AVRG	16.7	25.0

FORM VII TPH

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802300

Instrument ID: FID-8

Calibration Date(s): 12/14/07 12/15/07

Column:

ID: 2.00 (mm)

Calibration Time(s): 1835 0254

LAB FILE ID:

RF10: B0000011

RF50: B0000012

RF100: B0000013

RF250: B0000014

RF500: B0000015

COMPOUND	RF10	RF50	RF100	RF250	RF500
=====	=====	=====	=====	=====	=====
C6-C12	7097.000	3531.780	2762.820	2246.956	2067.656
>C12-C28	2310.600	2242.240	2219.390	2129.444	2181.016
C28-C35	2310.600	2242.240	2219.390	2129.444	2181.016
=====	=====	=====	=====	=====	=====
Trifluoromethyl benzene	1865.200	1708.900	1959.840	1853.560	1848.910
2-Fluorobiphenyl	2704.600	2494.900	2924.480	2755.600	2711.900

FORM VI TPH

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802300

Instrument ID: FID-8

Calibration Date(s): 12/14/07 12/15/07

Column:

ID: 2.00 (mm)

Calibration Time(s): 1835

0254

LAB FILE ID:

RF1000: B0000016 RF2000: B0000017

COMPOUND	RF1000	RF2000
=====	=====	=====
C6-C12	1990.727	2324.610
>C12-C28	2134.514	2502.706
C28-C35	2134.514	2502.706
=====	=====	=====
Trifluoromethyl benzene	1767.435	
2-Fluorobiphenyl		

FORM VI TPH

FORM 6  
TPH INITIAL CALIBRATION DATA

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802300

Instrument ID: FID-8

Calibration Date(s): 12/14/07 12/15/07

Column:

ID: 2.00 (mm)

Calibration Time(s): 1835

0254

COMPOUND	CURVE	COEFFICIENTS		%RSD OR R^2
		A0	A1	
C6-C12	LINR	7.92973050	4.4e-004	0.993
>C12-C28	LINR	33.8987435	4.027e-004	0.994
C28-C35	LINR	33.8987435	4.027e-004	0.994
Trifluoromethyl benzene	AVRG		1833.97417	4.7
2-Fluorobiphenyl	AVRG		2718.29600	5.6

FORM VI TPH

FORM 7  
TPH CONTINUING CALIBRATION CHECK

Lab Name:

Contract:

Lab Code:

Case No.:

SAS No.:

SDG No.: 0802300

Instrument ID: FID-8

Calibration Date: 02/22/08

Time: 1516

Lab File ID: B0000033

Init. Calib. Date(s): 12/14/07

01/29/08

Init. Calib. Times: 1835

1900

GC Column:

ID: 2.00 (mm)

COMPOUND	SAMPLE AMOUNT	CAL250 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
C6-C12	294.844	250.000	LINR	17.9	25.0
>C12-C28	242.581	250.000	AVRG	3.0	25.0
<del>C28-C35</del>	<del>0.097</del>	<del>250.000</del>	<del>AVRG</del>	<del>100.0</del>	<del>25.0</del>
=====	=====	=====	=====	=====	=====
Trifluoromethyl benzene	57.044	50.000	AVRG	14.1	25.0
2-Fluorobiphenyl	45.346	50.000	AVRG	9.3	25.0

FORM VII TPH

FORM 7  
TPH CONTINUING CALIBRATION CHECK

Lab Name: \_\_\_\_\_ Contract: \_\_\_\_\_

Lab Code: \_\_\_\_\_ Case No.: \_\_\_\_\_ SAS No.: \_\_\_\_\_ SDG No.: 0802300

Instrument ID: FID-8 Calibration Date: 02/22/08 Time: 2048

Lab File ID: B0000041 Init. Calib. Date(s): 12/14/07 01/29/08

Init. Calib. Times: 1835 1900

GC Column: \_\_\_\_\_ ID: 2.00 (mm)

COMPOUND	SAMPLE AMOUNT	CAL250 AMOUNT	CURVE	%D	MAX %d
=====	=====	=====	=====	=====	=====
C6-C12	308.431	250.000	LINR	23.4	25.0
>C12-C28	265.394	250.000	AVRG	6.2	25.0
<del>C28-C35</del>	<del>0.000</del>	<del>250.000</del>	<del>AVRG</del>	<del>100.0</del>	<del>25.0</del>
=====	=====	=====	=====	=====	=====
Trifluoromethyl benzene	59.901	50.000	AVRG	19.8	25.0
2-Fluorobiphenyl	53.316	50.000	AVRG	6.6	25.0

FORM VII TPH

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: ICP7500 080227A

Continuing Calibration Source:

Start: 2/27/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Lithium	100.0	97.33	97.33	100.0	95.50	95.5	95.64	95.64	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: ICP7500 080227A

Continuing Calibration Source:

Start: 2/27/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Lithium	100.0	97.33	97.33	100.0	94.25	94.25	96.51	96.51	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN



2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc. Contract:  
Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.: SDG No.: 0802300  
Initial Calibration Source: Run: ICP7500 080227A  
Continuing Calibration Source: Start: 2/27/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Lithium	100.0	97.33	97.33	100.0	96.80	96.8			P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: ICPMS02 080219A

Continuing Calibration Source:

Start: 2/19/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	103.10	103.1	100.0	101.10	101.1	108.50	108.5	P
Antimony	100.0	100.70	100.7	100.0	100.90	100.9	98.04	98.04	P
Arsenic	100.0	101.30	101.3	100.0	99.24	99.24	98.03	98.03	P
Barium	100.0	101.60	101.6	100.0	99.52	99.52	98.99	98.99	P
Beryllium	100.0	101.10	101.1	100.0	99.71	99.71	97.89	97.89	P
Boron	500.0	520.50	104.1	500.0	489.30	97.86	479.00	95.8	P
Cadmium	100.0	102.20	102.2	100.0	99.75	99.75	99.51	99.51	P
Calcium	10000.0	10300.00	103	10000.0	10200.00	102	10340.00	103.4	P
Chromium	100.0	100.40	100.4	100.0	100.80	100.8	101.50	101.5	P
Cobalt	100.0	103.50	103.5	100.0	102.00	102	102.30	102.3	P
Copper	100.0	102.60	102.6	100.0	100.70	100.7	101.40	101.4	P
Iron	10000.0	10270.00	102.7	10000.0	10160.00	101.6	10140.00	101.4	P
Lead	100.0	104.00	104	100.0	100.60	100.6	100.10	100.1	P
Magnesium	10000.0	10390.00	103.9	10000.0	10150.00	101.5	10460.00	104.6	P
Manganese	100.0	101.30	101.3	100.0	99.95	99.95	101.60	101.6	P
Molybdenum	100.0	99.82	99.82	100.0	102.10	102.1	100.10	100.1	P
Nickel	100.0	101.70	101.7	100.0	100.80	100.8	101.90	101.9	P
Potassium	10000.0	10190.00	101.9	10000.0	9998.00	99.98	10310.00	103.1	P
Selenium	100.0	100.20	100.2	100.0	104.50	104.5	101.00	101	P
Silver	100.0	105.40	105.4	100.0	102.60	102.6	100.80	100.8	P
Sodium	10000.0	10220.00	102.2	10000.0	10010.00	100.1	10240.00	102.4	P
Strontium	100.0	100.70	100.7	100.0	99.74	99.74	99.29	99.29	P
Thallium	100.0	101.90	101.9	100.0	100.80	100.8	99.52	99.52	P
Tin	100.0	107.40	107.4	100.0	100.50	100.5	99.76	99.76	P
Titanium	100.0	99.76	99.76	100.0	100.70	100.7	101.40	101.4	P
Vanadium	100.0	101.20	101.2	100.0	99.65	99.65	101.10	101.1	P
Zinc	100.0	100.20	100.2	100.0	99.54	99.54	98.20	98.2	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: ICPMS02 080219A

Continuing Calibration Source:

Start: 2/19/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	103.10	103.1	100.0	125.30	125.3	90.83	90.83	P
Antimony	100.0	100.70	100.7	100.0	95.25	95.25	98.20	98.2	P
Arsenic	100.0	101.30	101.3	100.0	97.99	97.99	98.81	98.81	P
Barium	100.0	101.60	101.6	100.0	96.91	96.91	100.80	100.8	P
Beryllium	100.0	101.10	101.1	100.0	96.40	96.4	101.50	101.5	P
Boron	500.0	520.50	104.1	500.0	474.60	94.92	517.80	103.56	P
Cadmium	100.0	102.20	102.2	100.0	98.63	98.63	103.00	103	P
Calcium	10000.0	10300.00	103	10000.0	10240.00	102.4	10320.00	103.2	P
Chromium	100.0	100.40	100.4	100.0	99.91	99.91	99.81	99.81	P
Cobalt	100.0	103.50	103.5	100.0	102.80	102.8	101.70	101.7	P
Copper	100.0	102.60	102.6	100.0	100.80	100.8	100.20	100.2	P
Iron	10000.0	10270.00	102.7	10000.0	10190.00	101.9	10330.00	103.3	P
Lead	100.0	104.00	104	100.0	101.80	101.8	104.00	104	P
Magnesium	10000.0	10390.00	103.9	10000.0	10600.00	106	10380.00	103.8	P
Manganese	100.0	101.30	101.3	100.0	100.50	100.5	101.70	101.7	P
Molybdenum	100.0	99.82	99.82	100.0	98.62	98.62	102.60	102.6	P
Nickel	100.0	101.70	101.7	100.0	101.20	101.2	103.90	103.9	P
Potassium	10000.0	10190.00	101.9	10000.0	10240.00	102.4	10090.00	100.9	P
Selenium	100.0	100.20	100.2	100.0	99.05	99.05	100.70	100.7	P
Silver	100.0	105.40	105.4	100.0	100.40	100.4	104.00	104	P
Sodium	10000.0	10220.00	102.2	10000.0	10290.00	102.9	10420.00	104.2	P
Strontium	100.0	100.70	100.7	100.0	99.33	99.33	101.20	101.2	P
Thallium	100.0	101.90	101.9	100.0	100.10	100.1	103.10	103.1	P
Tin	100.0	107.40	107.4	100.0	101.10	101.1	104.60	104.6	P
Titanium	100.0	99.76	99.76	100.0	100.30	100.3	101.10	101.1	P
Vanadium	100.0	101.20	101.2	100.0	100.70	100.7	100.60	100.6	P
Zinc	100.0	100.20	100.2	100.0	96.75	96.75	102.00	102	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: ICPMS02 080219A

Continuing Calibration Source:

Start: 2/19/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	103.10	103.1	100.0	109.60	109.6	176.40	176.4	P
Antimony	100.0	100.70	100.7	100.0	93.10	93.1	94.69	94.69	P
Arsenic	100.0	101.30	101.3	100.0	95.51	95.51	99.94	99.94	P
Barium	100.0	101.60	101.6	100.0	98.67	98.67	100.20	100.2	P
Beryllium	100.0	101.10	101.1	100.0	97.65	97.65	96.95	96.95	P
Boron	500.0	520.50	104.1	500.0	484.50	96.9	489.40	97.88	P
Cadmium	100.0	102.20	102.2	100.0	100.00	100	100.70	100.7	P
Calcium	10000.0	10300.00	103	10000.0	10070.00	100.7	10600.00	106	P
Chromium	100.0	100.40	100.4	100.0	97.63	97.63	101.80	101.8	P
Cobalt	100.0	103.50	103.5	100.0	98.25	98.25	103.40	103.4	P
Copper	100.0	102.60	102.6	100.0	98.12	98.12	103.30	103.3	P
Iron	10000.0	10270.00	102.7	10000.0	10020.00	100.2	10370.00	103.7	P
Lead	100.0	104.00	104	100.0	102.50	102.5	103.70	103.7	P
Magnesium	10000.0	10390.00	103.9	10000.0	10130.00	101.3	10010.00	100.1	P
Manganese	100.0	101.30	101.3	100.0	99.00	99	104.70	104.7	P
Molybdenum	100.0	99.82	99.82	100.0	98.38	98.38	99.35	99.35	P
Nickel	100.0	101.70	101.7	100.0	100.30	100.3	100.90	100.9	P
Potassium	10000.0	10190.00	101.9	10000.0	9871.00	98.71	9900.00	99	P
Selenium	100.0	100.20	100.2	100.0	97.70	97.7	97.87	97.87	P
Silver	100.0	105.40	105.4	100.0	100.30	100.3	100.40	100.4	P
Sodium	10000.0	10220.00	102.2	10000.0	10130.00	101.3	9958.00	99.58	P
Strontium	100.0	100.70	100.7	100.0	99.24	99.24	101.20	101.2	P
Thallium	100.0	101.90	101.9	100.0	99.42	99.42	101.70	101.7	P
Tin	100.0	107.40	107.4	100.0	101.70	101.7	102.60	102.6	P
Titanium	100.0	99.76	99.76	100.0	98.11	98.11	101.00	101	P
Vanadium	100.0	101.20	101.2	100.0	98.28	98.28	103.30	103.3	P
Zinc	100.0	100.20	100.2	100.0	98.78	98.78	101.20	101.2	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: ICPMS02 080219A

Continuing Calibration Source:

Start: 2/19/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	103.10	103.1	100.0	108.40	108.4			P
Antimony	100.0	100.70	100.7	100.0	95.36	95.36			P
Arsenic	100.0	101.30	101.3	100.0	101.10	101.1			P
Barium	100.0	101.60	101.6	100.0	98.42	98.42			P
Beryllium	100.0	101.10	101.1	100.0	97.58	97.58			P
Boron	500.0	520.50	104.1	500.0	484.90	96.98			P
Cadmium	100.0	102.20	102.2	100.0	100.40	100.4			P
Calcium	10000.0	10300.00	103	10000.0	9795.00	97.95			P
Chromium	100.0	100.40	100.4	100.0	101.40	101.4			P
Cobalt	100.0	103.50	103.5	100.0	102.30	102.3			P
Copper	100.0	102.60	102.6	100.0	101.50	101.5			P
Iron	10000.0	10270.00	102.7	10000.0	9948.00	99.48			P
Lead	100.0	104.00	104	100.0	101.40	101.4			P
Magnesium	10000.0	10390.00	103.9	10000.0	9593.00	95.93			P
Manganese	100.0	101.30	101.3	100.0	102.40	102.4			P
Molybdenum	100.0	99.82	99.82	100.0	96.63	96.63			P
Nickel	100.0	101.70	101.7	100.0	97.98	97.98			P
Potassium	10000.0	10190.00	101.9	10000.0	9624.00	96.24			P
Selenium	100.0	100.20	100.2	100.0	97.05	97.05			P
Silver	100.0	105.40	105.4	100.0	98.29	98.29			P
Sodium	10000.0	10220.00	102.2	10000.0	9586.00	95.86			P
Strontium	100.0	100.70	100.7	100.0	98.55	98.55			P
Thallium	100.0	101.90	101.9	100.0	100.70	100.7			P
Tin	100.0	107.40	107.4	100.0	102.90	102.9			P
Titanium	100.0	99.76	99.76	100.0	96.78	96.78			P
Vanadium	100.0	101.20	101.2	100.0	102.00	102			P
Zinc	100.0	100.20	100.2	100.0	98.18	98.18			P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: ICPMS02 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	105.50	105.5	100.0	104.20	104.2	102.70	102.7	P
Antimony	100.0	100.40	100.4	100.0	102.80	102.8	105.90	105.9	P
Arsenic	100.0	101.20	101.2	100.0	100.80	100.8	103.20	103.2	P
Barium	100.0	103.80	103.8	100.0	103.40	103.4	105.20	105.2	P
Beryllium	100.0	102.60	102.6	100.0	102.90	102.9	101.80	101.8	P
Boron	500.0	523.70	104.74	500.0	509.00	101.8	505.80	101.16	P
Cadmium	100.0	105.30	105.3	100.0	103.40	103.4	104.40	104.4	P
Calcium	10000.0	10240.00	102.4	10000.0	10450.00	104.5	10520.00	105.2	P
Chromium	100.0	101.10	101.1	100.0	104.60	104.6	106.40	106.4	P
Cobalt	100.0	104.60	104.6	100.0	103.70	103.7	104.30	104.3	P
Copper	100.0	101.50	101.5	100.0	102.50	102.5	102.80	102.8	P
Iron	10000.0	10150.00	101.5	10000.0	10300.00	103	10410.00	104.1	P
Lead	100.0	105.10	105.1	100.0	105.60	105.6	105.90	105.9	P
Magnesium	10000.0	10460.00	104.6	10000.0	10270.00	102.7	10370.00	103.7	P
Manganese	100.0	102.40	102.4	100.0	103.30	103.3	105.20	105.2	P
Molybdenum	100.0	100.30	100.3	100.0	104.30	104.3	104.70	104.7	P
Nickel	100.0	104.80	104.8	100.0	106.10	106.1	105.00	105	P
Potassium	10000.0	10240.00	102.4	10000.0	10330.00	103.3	10400.00	104	P
Selenium	100.0	102.30	102.3	100.0	105.70	105.7	104.60	104.6	P
Silver	100.0	106.00	106	100.0	104.70	104.7	105.80	105.8	P
Sodium	10000.0	10270.00	102.7	10000.0	10300.00	103	10310.00	103.1	P
Strontium	100.0	100.80	100.8	100.0	102.20	102.2	102.00	102	P
Thallium	100.0	102.30	102.3	100.0	104.10	104.1	105.00	105	P
Tin	100.0	109.50	109.5	100.0	104.30	104.3	105.20	105.2	P
Titanium	100.0	104.40	104.4	100.0	103.30	103.3	103.80	103.8	P
Vanadium	100.0	104.00	104	100.0	102.20	102.2	102.80	102.8	P
Zinc	100.0	103.00	103	100.0	102.80	102.8	103.40	103.4	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM FIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: ICPMS02 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	105.50	105.5	100.0	100.70	100.7	103.30	103.3	P
Antimony	100.0	100.40	100.4	100.0	103.10	103.1	104.90	104.9	P
Arsenic	100.0	101.20	101.2	100.0	101.50	101.5	102.50	102.5	P
Barium	100.0	103.80	103.8	100.0	101.70	101.7	100.70	100.7	P
Beryllium	100.0	102.60	102.6	100.0	101.00	101	100.80	100.8	P
Boron	500.0	523.70	104.74	500.0	499.50	99.9	500.40	100.08	P
Cadmium	100.0	105.30	105.3	100.0	100.50	100.5	101.70	101.7	P
Calcium	10000.0	10240.00	102.4	10000.0	10340.00	103.4	10180.00	101.8	P
Chromium	100.0	101.10	101.1	100.0	103.50	103.5	105.20	105.2	P
Cobalt	100.0	104.60	104.6	100.0	101.80	101.8	102.60	102.6	P
Copper	100.0	101.50	101.5	100.0	100.30	100.3	101.70	101.7	P
Iron	10000.0	10150.00	101.5	10000.0	10180.00	101.8	10080.00	100.8	P
Lead	100.0	105.10	105.1	100.0	103.40	103.4	101.80	101.8	P
Magnesium	10000.0	10460.00	104.6	10000.0	10200.00	102	10060.00	100.6	P
Manganese	100.0	102.40	102.4	100.0	103.80	103.8	104.10	104.1	P
Molybdenum	100.0	100.30	100.3	100.0	102.90	102.9	101.90	101.9	P
Nickel	100.0	104.80	104.8	100.0	104.30	104.3	102.80	102.8	P
Potassium	10000.0	10240.00	102.4	10000.0	10360.00	103.6	10070.00	100.7	P
Selenium	100.0	102.30	102.3	100.0	104.60	104.6	102.00	102	P
Silver	100.0	106.00	106	100.0	104.90	104.9	102.50	102.5	P
Sodium	10000.0	10270.00	102.7	10000.0	10230.00	102.3	10030.00	100.3	P
Strontium	100.0	100.80	100.8	100.0	100.30	100.3	99.32	99.32	P
Thallium	100.0	102.30	102.3	100.0	102.50	102.5	100.50	100.5	P
Tin	100.0	109.50	109.5	100.0	101.60	101.6	102.00	102	P
Titanium	100.0	104.40	104.4	100.0	101.50	101.5	100.20	100.2	P
Vanadium	100.0	104.00	104	100.0	101.60	101.6	103.20	103.2	P
Zinc	100.0	103.00	103	100.0	101.00	101	99.91	99.91	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: ICPMS02 080220A

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	105.50	105.5	100.0	97.79	97.79	100.90	100.9	P
Antimony	100.0	100.40	100.4	100.0	98.48	98.48	96.13	96.13	P
Arsenic	100.0	101.20	101.2	100.0	98.41	98.41	99.34	99.34	P
Barium	100.0	103.80	103.8	100.0	102.30	102.3	101.50	101.5	P
Beryllium	100.0	102.60	102.6	100.0	98.19	98.19	98.73	98.73	P
Boron	500.0	523.70	104.74	500.0	496.10	99.22	499.80	99.96	P
Cadmium	100.0	105.30	105.3	100.0	100.30	100.3	101.70	101.7	P
Calcium	10000.0	10240.00	102.4	10000.0	10360.00	103.6	10510.00	105.1	P
Chromium	100.0	101.10	101.1	100.0	99.41	99.41	102.00	102	P
Cobalt	100.0	104.60	104.6	100.0	97.47	97.47	99.20	99.2	P
Copper	100.0	101.50	101.5	100.0	94.07	94.07	95.20	95.2	P
Iron	10000.0	10150.00	101.5	10000.0	10050.00	100.5	10140.00	101.4	P
Lead	100.0	105.10	105.1	100.0	103.20	103.2	102.50	102.5	P
Magnesium	10000.0	10460.00	104.6	10000.0	10000.00	100	10080.00	100.8	P
Manganese	100.0	102.40	102.4	100.0	101.20	101.2	102.60	102.6	P
Molybdenum	100.0	100.30	100.3	100.0	98.26	98.26	96.86	96.86	P
Nickel	100.0	104.80	104.8	100.0	97.72	97.72	100.10	100.1	P
Potassium	10000.0	10240.00	102.4	10000.0	10170.00	101.7	10280.00	102.8	P
Selenium	100.0	102.30	102.3	100.0	101.90	101.9	100.20	100.2	P
Silver	100.0	106.00	106	100.0	99.35	99.35	98.94	98.94	P
Sodium	10000.0	10270.00	102.7	10000.0	10220.00	102.2	10450.00	104.5	P
Strontium	100.0	100.80	100.8	100.0	98.79	98.79	97.89	97.89	P
Thallium	100.0	102.30	102.3	100.0	101.10	101.1	103.00	103	P
Tin	100.0	109.50	109.5	100.0	102.40	102.4	102.10	102.1	P
Titanium	100.0	104.40	104.4	100.0	98.62	98.62	98.57	98.57	P
Vanadium	100.0	104.00	104	100.0	99.19	99.19	101.80	101.8	P
Zinc	100.0	103.00	103	100.0	98.85	98.85	100.20	100.2	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN



2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: ICPMS02 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.60	100.6	100.0	96.63	96.63	94.58	94.58	P
Antimony	100.0	101.20	101.2	100.0	108.40	108.4	104.60	104.6	P
Arsenic	100.0	101.00	101	100.0	105.10	105.1	99.90	99.9	P
Barium	100.0	101.70	101.7	100.0	99.84	99.84	101.00	101	P
Beryllium	100.0	100.40	100.4	100.0	99.34	99.34	96.95	96.95	P
Boron	500.0	512.50	102.5	500.0	500.10	100.02	488.00	97.6	P
Cadmium	100.0	102.00	102	100.0	99.60	99.6	99.48	99.48	P
Calcium	10000.0	9980.00	99.8	10000.0	10110.00	101.1	9955.00	99.55	P
Chromium	100.0	101.10	101.1	100.0	106.70	106.7	101.50	101.5	P
Cobalt	100.0	103.10	103.1	100.0	107.30	107.3	102.00	102	P
Copper	100.0	102.10	102.1	100.0	107.60	107.6	103.30	103.3	P
Iron	10000.0	10050.00	100.5	10000.0	9974.00	99.74	9911.00	99.11	P
Lead	100.0	102.50	102.5	100.0	99.12	99.12	99.09	99.09	P
Magnesium	10000.0	10020.00	100.2	10000.0	9707.00	97.07	9361.00	93.61	P
Manganese	100.0	100.40	100.4	100.0	106.60	106.6	100.10	100.1	P
Molybdenum	100.0	98.98	98.98	100.0	101.80	101.8	102.10	102.1	P
Nickel	100.0	101.50	101.5	100.0	100.50	100.5	98.63	98.63	P
Potassium	10000.0	9894.00	98.94	10000.0	9961.00	99.61	9725.00	97.25	P
Selenium	100.0	97.48	97.48	100.0	98.70	98.7	102.20	102.2	P
Silver	100.0	104.80	104.8	100.0	101.70	101.7	103.00	103	P
Sodium	10000.0	9837.00	98.37	10000.0	9878.00	98.78	10900.00	109	P
Strontium	100.0	97.16	97.16	100.0	96.36	96.36	97.80	97.8	P
Thallium	100.0	99.63	99.63	100.0	99.77	99.77	99.54	99.54	P
Tin	100.0	106.30	106.3	100.0	100.40	100.4	100.20	100.2	P
Titanium	100.0	100.10	100.1	100.0	98.45	98.45	98.16	98.16	P
Vanadium	100.0	103.10	103.1	100.0	106.30	106.3	100.00	100	P
Zinc	100.0	100.50	100.5	100.0	98.72	98.72	97.23	97.23	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: ICPMS02 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.60	100.6	100.0	73.68	73.68	98.32	98.32	P
Antimony	100.0	101.20	101.2	100.0	116.10	116.1	100.90	100.9	P
Arsenic	100.0	101.00	101	100.0	99.83	99.83	98.43	98.43	P
Barium	100.0	101.70	101.7	100.0	103.60	103.6	98.61	98.61	P
Beryllium	100.0	100.40	100.4	100.0	86.34	86.34	100.50	100.5	P
Boron	500.0	512.50	102.5	500.0	418.70	83.74	512.30	102.46	P
Cadmium	100.0	102.00	102	100.0	98.99	98.99	99.50	99.5	P
Calcium	10000.0	9980.00	99.8	10000.0	8103.00	81.03	9384.00	93.84	P
Chromium	100.0	101.10	101.1	100.0	98.15	98.15	100.40	100.4	P
Cobalt	100.0	103.10	103.1	100.0	97.85	97.85	101.00	101	P
Copper	100.0	102.10	102.1	100.0	99.64	99.64	100.70	100.7	P
Iron	10000.0	10050.00	100.5	10000.0	9164.00	91.64	10020.00	100.2	P
Lead	100.0	102.50	102.5	100.0	99.67	99.67	99.07	99.07	P
Magnesium	10000.0	10020.00	100.2	10000.0	7322.00	73.22	9960.00	99.6	P
Manganese	100.0	100.40	100.4	100.0	94.60	94.6	101.60	101.6	P
Molybdenum	100.0	98.98	98.98	100.0	111.40	111.4	98.95	98.95	P
Nickel	100.0	101.50	101.5	100.0	89.62	89.62	100.50	100.5	P
Potassium	10000.0	9894.00	98.94	10000.0	8507.00	85.07	9922.00	99.22	P
Selenium	100.0	97.48	97.48	100.0	103.60	103.6	98.36	98.36	P
Silver	100.0	104.80	104.8	100.0	116.10	116.1	100.50	100.5	P
Sodium	10000.0	9837.00	98.37	10000.0	7943.00	79.43	9994.00	99.94	P
Strontium	100.0	97.16	97.16	100.0	106.40	106.4	94.67	94.67	P
Thallium	100.0	99.63	99.63	100.0	99.05	99.05	98.54	98.54	P
Tin	100.0	106.30	106.3	100.0	102.40	102.4	99.12	99.12	P
Titanium	100.0	100.10	100.1	100.0	84.57	84.57	99.56	99.56	P
Vanadium	100.0	103.10	103.1	100.0	93.80	93.8	100.40	100.4	P
Zinc	100.0	100.50	100.5	100.0	96.19	96.19	98.23	98.23	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: ICPMS02 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.60	100.6	100.0	106.30	106.3	103.70	103.7	P
Antimony	100.0	101.20	101.2	100.0	101.20	101.2	101.20	101.2	P
Arsenic	100.0	101.00	101	100.0	100.30	100.3	99.01	99.01	P
Barium	100.0	101.70	101.7	100.0	99.98	99.98	97.89	97.89	P
Beryllium	100.0	100.40	100.4	100.0	103.20	103.2	101.00	101	P
Boron	500.0	512.50	102.5	500.0	521.00	104.2	512.50	102.5	P
Cadmium	100.0	102.00	102	100.0	102.10	102.1	99.02	99.02	P
Calcium	10000.0	9980.00	99.8	10000.0	10080.00	100.8	9924.00	99.24	P
Chromium	100.0	101.10	101.1	100.0	102.50	102.5	102.80	102.8	P
Cobalt	100.0	103.10	103.1	100.0	105.50	105.5	102.90	102.9	P
Copper	100.0	102.10	102.1	100.0	104.70	104.7	103.30	103.3	P
Iron	10000.0	10050.00	100.5	10000.0	10230.00	102.3	10170.00	101.7	P
Lead	100.0	102.50	102.5	100.0	103.10	103.1	99.39	99.39	P
Magnesium	10000.0	10020.00	100.2	10000.0	10730.00	107.3	10730.00	107.3	P
Manganese	100.0	100.40	100.4	100.0	105.20	105.2	103.70	103.7	P
Molybdenum	100.0	98.98	98.98	100.0	97.96	97.96	97.98	97.98	P
Nickel	100.0	101.50	101.5	100.0	102.50	102.5	102.00	102	P
Potassium	10000.0	9894.00	98.94	10000.0	10370.00	103.7	10340.00	103.4	P
Selenium	100.0	97.48	97.48	100.0	97.74	97.74	97.06	97.06	P
Silver	100.0	104.80	104.8	100.0	102.30	102.3	98.11	98.11	P
Sodium	10000.0	9837.00	98.37	10000.0	10810.00	108.1	10670.00	106.7	P
Strontium	100.0	97.16	97.16	100.0	94.92	94.92	92.71	92.71	P
Thallium	100.0	99.63	99.63	100.0	99.44	99.44	98.44	98.44	P
Tin	100.0	106.30	106.3	100.0	106.30	106.3	98.71	98.71	P
Titanium	100.0	100.10	100.1	100.0	105.60	105.6	101.80	101.8	P
Vanadium	100.0	103.10	103.1	100.0	106.90	106.9	103.70	103.7	P
Zinc	100.0	100.50	100.5	100.0	101.50	101.5	120.80	120.8	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: ICPMS02 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.60	100.6	100.0	105.10	105.1	106.90	106.9	P
Antimony	100.0	101.20	101.2	100.0	103.30	103.3	99.29	99.29	P
Arsenic	100.0	101.00	101	100.0	100.20	100.2	99.34	99.34	P
Barium	100.0	101.70	101.7	100.0	97.76	97.76	98.80	98.8	P
Beryllium	100.0	100.40	100.4	100.0	102.00	102	103.70	103.7	P
Boron	500.0	512.50	102.5	500.0	514.50	102.9	524.10	104.82	P
Cadmium	100.0	102.00	102	100.0	99.39	99.39	98.76	98.76	P
Calcium	10000.0	9980.00	99.8	10000.0	9732.00	97.32	10440.00	104.4	P
Chromium	100.0	101.10	101.1	100.0	102.80	102.8	101.30	101.3	P
Cobalt	100.0	103.10	103.1	100.0	103.70	103.7	102.00	102	P
Copper	100.0	102.10	102.1	100.0	103.30	103.3	102.10	102.1	P
Iron	10000.0	10050.00	100.5	10000.0	10230.00	102.3	10360.00	103.6	P
Lead	100.0	102.50	102.5	100.0	99.07	99.07	98.40	98.4	P
Magnesium	10000.0	10020.00	100.2	10000.0	10910.00	109.1	10970.00	109.7	P
Manganese	100.0	100.40	100.4	100.0	103.50	103.5	103.80	103.8	P
Molybdenum	100.0	98.98	98.98	100.0	98.02	98.02	96.83	96.83	P
Nickel	100.0	101.50	101.5	100.0	102.10	102.1	102.80	102.8	P
Potassium	10000.0	9894.00	98.94	10000.0	10510.00	105.1	10510.00	105.1	P
Selenium	100.0	97.48	97.48	100.0	95.95	95.95	94.88	94.88	P
Silver	100.0	104.80	104.8	100.0	97.93	97.93	95.15	95.15	P
Sodium	10000.0	9837.00	98.37	10000.0	10690.00	106.9	10830.00	108.3	P
Strontium	100.0	97.16	97.16	100.0	93.06	93.06	91.91	91.91	P
Thallium	100.0	99.63	99.63	100.0	98.80	98.8	98.25	98.25	P
Tin	100.0	106.30	106.3	100.0	99.08	99.08	99.37	99.37	P
Titanium	100.0	100.10	100.1	100.0	102.60	102.6	104.10	104.1	P
Vanadium	100.0	103.10	103.1	100.0	102.60	102.6	101.60	101.6	P
Zinc	100.0	100.50	100.5	100.0	118.30	118.3	106.00	106	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: ICPMS02 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.60	100.6	100.0	112.20	112.2	100.60	100.6	P
Antimony	100.0	101.20	101.2	100.0	96.77	96.77	100.30	100.3	P
Arsenic	100.0	101.00	101	100.0	99.98	99.98	100.80	100.8	P
Barium	100.0	101.70	101.7	100.0	98.04	98.04	103.00	103	P
Beryllium	100.0	100.40	100.4	100.0	107.10	107.1	102.10	102.1	P
Boron	500.0	512.50	102.5	500.0	550.40	110.08	509.00	101.8	P
Cadmium	100.0	102.00	102	100.0	99.34	99.34	104.10	104.1	P
Calcium	10000.0	9980.00	99.8	10000.0	10810.00	108.1	10130.00	101.3	P
Chromium	100.0	101.10	101.1	100.0	99.55	99.55	99.32	99.32	P
Cobalt	100.0	103.10	103.1	100.0	102.80	102.8	102.20	102.2	P
Copper	100.0	102.10	102.1	100.0	101.90	101.9	100.90	100.9	P
Iron	10000.0	10050.00	100.5	10000.0	10320.00	103.2	10260.00	102.6	P
Lead	100.0	102.50	102.5	100.0	100.40	100.4	105.30	105.3	P
Magnesium	10000.0	10020.00	100.2	10000.0	11400.00	114	10100.00	101	P
Manganese	100.0	100.40	100.4	100.0	103.30	103.3	99.14	99.14	P
Molybdenum	100.0	98.98	98.98	100.0	92.08	92.08	102.40	102.4	P
Nickel	100.0	101.50	101.5	100.0	102.70	102.7	104.70	104.7	P
Potassium	10000.0	9894.00	98.94	10000.0	10700.00	107	10130.00	101.3	P
Selenium	100.0	97.48	97.48	100.0	96.07	96.07	101.70	101.7	P
Silver	100.0	104.80	104.8	100.0	95.34	95.34	107.50	107.5	P
Sodium	10000.0	9837.00	98.37	10000.0	11080.00	110.8	9911.00	99.11	P
Strontium	100.0	97.16	97.16	100.0	91.04	91.04	99.12	99.12	P
Thallium	100.0	99.63	99.63	100.0	98.54	98.54	102.10	102.1	P
Tin	100.0	106.30	106.3	100.0	104.40	104.4	108.50	108.5	P
Titanium	100.0	100.10	100.1	100.0	107.10	107.1	103.50	103.5	P
Vanadium	100.0	103.10	103.1	100.0	103.50	103.5	101.00	101	P
Zinc	100.0	100.50	100.5	100.0	100.90	100.9	99.91	99.91	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: ICPMS02 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.60	100.6	100.0	127.10	127.1	102.40	102.4	P
Antimony	100.0	101.20	101.2	100.0	104.80	104.8	104.50	104.5	P
Arsenic	100.0	101.00	101	100.0	98.69	98.69	101.60	101.6	P
Barium	100.0	101.70	101.7	100.0	106.00	106	105.70	105.7	P
Beryllium	100.0	100.40	100.4	100.0	96.35	96.35	99.22	99.22	P
Boron	500.0	512.50	102.5	500.0	477.00	95.4	490.90	98.18	P
Cadmium	100.0	102.00	102	100.0	102.50	102.5	105.10	105.1	P
Calcium	10000.0	9980.00	99.8	10000.0	9207.00	92.07	9048.00	90.48	P
Chromium	100.0	101.10	101.1	100.0	99.35	99.35	100.00	100	P
Cobalt	100.0	103.10	103.1	100.0	99.53	99.53	102.00	102	P
Copper	100.0	102.10	102.1	100.0	99.57	99.57	101.70	101.7	P
Iron	10000.0	10050.00	100.5	10000.0	10090.00	100.9	10160.00	101.6	P
Lead	100.0	102.50	102.5	100.0	104.10	104.1	107.20	107.2	P
Magnesium	10000.0	10020.00	100.2	10000.0	9067.00	90.67	9116.00	91.16	P
Manganese	100.0	100.40	100.4	100.0	97.87	97.87	98.41	98.41	P
Molybdenum	100.0	98.98	98.98	100.0	121.80	121.8	110.80	110.8	P
Nickel	100.0	101.50	101.5	100.0	100.90	100.9	101.90	101.9	P
Potassium	10000.0	9894.00	98.94	10000.0	9675.00	96.75	9710.00	97.1	P
Selenium	100.0	97.48	97.48	100.0	106.30	106.3	100.00	100	P
Silver	100.0	104.80	104.8	100.0	109.40	109.4	111.80	111.8	P
Sodium	10000.0	9837.00	98.37	10000.0	9109.00	91.09	9204.00	92.04	P
Strontium	100.0	97.16	97.16	100.0	102.70	102.7	103.80	103.8	P
Thallium	100.0	99.63	99.63	100.0	103.20	103.2	103.60	103.6	P
Tin	100.0	106.30	106.3	100.0	104.40	104.4	110.20	110.2	P
Titanium	100.0	100.10	100.1	100.0	96.50	96.5	99.29	99.29	P
Vanadium	100.0	103.10	103.1	100.0	96.76	96.76	100.80	100.8	P
Zinc	100.0	100.50	100.5	100.0	101.60	101.6	101.50	101.5	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: ICPMS02 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.60	100.6	100.0	95.94	95.94	95.19	95.19	P
Antimony	100.0	101.20	101.2	100.0	104.10	104.1	106.70	106.7	P
Arsenic	100.0	101.00	101	100.0	101.50	101.5	105.40	105.4	P
Barium	100.0	101.70	101.7	100.0	108.10	108.1	101.50	101.5	P
Beryllium	100.0	100.40	100.4	100.0	100.70	100.7	97.39	97.39	P
Boron	500.0	512.50	102.5	500.0	500.30	100.06	485.10	97.02	P
Cadmium	100.0	102.00	102	100.0	106.50	106.5	101.60	101.6	P
Calcium	10000.0	9980.00	99.8	10000.0	9472.00	94.72	9400.00	94	P
Chromium	100.0	101.10	101.1	100.0	99.01	99.01	104.50	104.5	P
Cobalt	100.0	103.10	103.1	100.0	102.70	102.7	107.10	107.1	P
Copper	100.0	102.10	102.1	100.0	101.30	101.3	105.90	105.9	P
Iron	10000.0	10050.00	100.5	10000.0	10260.00	102.6	10020.00	100.2	P
Lead	100.0	102.50	102.5	100.0	109.10	109.1	103.20	103.2	P
Magnesium	10000.0	10020.00	100.2	10000.0	9407.00	94.07	9502.00	95.02	P
Manganese	100.0	100.40	100.4	100.0	98.24	98.24	103.00	103	P
Molybdenum	100.0	98.98	98.98	100.0	106.70	106.7	100.70	100.7	P
Nickel	100.0	101.50	101.5	100.0	103.80	103.8	99.51	99.51	P
Potassium	10000.0	9894.00	98.94	10000.0	9912.00	99.12	9837.00	98.37	P
Selenium	100.0	97.48	97.48	100.0	106.20	106.2	99.36	99.36	P
Silver	100.0	104.80	104.8	100.0	111.40	111.4	107.90	107.9	P
Sodium	10000.0	9837.00	98.37	10000.0	9453.00	94.53	9485.00	94.85	P
Strontium	100.0	97.16	97.16	100.0	103.50	103.5	99.51	99.51	P
Thallium	100.0	99.63	99.63	100.0	105.60	105.6	100.10	100.1	P
Tin	100.0	106.30	106.3	100.0	111.50	111.5	106.30	106.3	P
Titanium	100.0	100.10	100.1	100.0	102.60	102.6	99.74	99.74	P
Vanadium	100.0	103.10	103.1	100.0	100.40	100.4	105.40	105.4	P
Zinc	100.0	100.50	100.5	100.0	103.10	103.1	97.32	97.32	P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: ICPMS02 080221A

Continuing Calibration Source:

Start: 2/21/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Aluminum	100.0	100.60	100.6	100.0	94.37	94.37			P
Antimony	100.0	101.20	101.2	100.0	101.30	101.3			P
Arsenic	100.0	101.00	101	100.0	98.15	98.15			P
Barium	100.0	101.70	101.7	100.0	102.80	102.8			P
Beryllium	100.0	100.40	100.4	100.0	96.87	96.87			P
Boron	500.0	512.50	102.5	500.0	485.90	97.18			P
Cadmium	100.0	102.00	102	100.0	101.80	101.8			P
Calcium	10000.0	9980.00	99.8	10000.0	9441.00	94.41			P
Chromium	100.0	101.10	101.1	100.0	98.33	98.33			P
Cobalt	100.0	103.10	103.1	100.0	101.60	101.6			P
Copper	100.0	102.10	102.1	100.0	100.10	100.1			P
Iron	10000.0	10050.00	100.5	10000.0	9957.00	99.57			P
Lead	100.0	102.50	102.5	100.0	104.20	104.2			P
Magnesium	10000.0	10020.00	100.2	10000.0	9324.00	93.24			P
Manganese	100.0	100.40	100.4	100.0	97.20	97.2			P
Molybdenum	100.0	98.98	98.98	100.0	101.50	101.5			P
Nickel	100.0	101.50	101.5	100.0	100.10	100.1			P
Potassium	10000.0	9894.00	98.94	10000.0	9656.00	96.56			P
Selenium	100.0	97.48	97.48	100.0	102.00	102			P
Silver	100.0	104.80	104.8	100.0	106.10	106.1			P
Sodium	10000.0	9837.00	98.37	10000.0	9222.00	92.22			P
Strontium	100.0	97.16	97.16	100.0	98.80	98.8			P
Thallium	100.0	99.63	99.63	100.0	100.40	100.4			P
Tin	100.0	106.30	106.3	100.0	106.60	106.6			P
Titanium	100.0	100.10	100.1	100.0	100.00	100			P
Vanadium	100.0	103.10	103.1	100.0	99.79	99.79			P
Zinc	100.0	100.50	100.5	100.0	96.82	96.82			P

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN



3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080227A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
	C		1	C	2	C	3	C	C		
Lithium	-0.4		-0.8		-0.8		-0.8		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): SOIL

Run: ICP7500 080227A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L) C		Continuing Calibration Blank (ug/L)						Prepa- ration Blank C		M
			1	C	2	C	3	C			
Lithium	-0.4		-0.7		-0.8				0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): WATER

Run: ICPMS02 080219A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	-0.3		0.1		6.6	J	12.0		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): WATER

Run: ICPMS02 080219A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
	C		1	C	2	C	3	C	C		
Aluminum	-0.3		-15.0		10.0	J	70.7		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): WATER

Run: ICPMS02 080219A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
	C		1	C	2	C	3	C	C		
Aluminum	-0.3		20.3						0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): SOIL

Run: ICPMS02 080219A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	0.3		0.0		0.0		0.0		0.000		P
Arsenic	0.5		0.4		0.4		0.3		0.000		P
Barium	0.4		0.1		0.2		0.3		0.000		P
Beryllium	0.6	J	0.2		0.2		0.2		0.041		P
Boron	12.1	J	0.9		-1.0		-1.3		0.694		P
Cadmium	0.3	J	-0.1		-0.1		-0.1		0.043		P
Calcium	-25.4		-96.0		-47.0		-24.0		0.000		P
Chromium	0.3		0.1		0.2		0.2		0.094		P
Cobalt	0.1	J	-0.1		-0.1		-0.1		0.000		P
Copper	-0.1		-0.3		-0.4		-0.4		0.000		P
Iron	37.6	J	-3.1		4.5		11.2		0.000		P
Lead	0.5	J	0.2		0.2	J	0.2		0.000		P
Magnesium	13.6		-23.0		-20.0		-19.0		3.905		P
Manganese	0.3		0.2		0.3		0.3		0.000		P
Molybdenum	0.4		0.0		0.0		0.0		0.000		P
Nickel	0.1		-0.3		-0.3		-0.3		0.000		P
Potassium	37.7	J	-1.3		-6.6		-8.1		6.417		P
Selenium	0.2		1.1		0.1		0.8		0.000		P
Silver	0.1		-0.2		-0.3		-0.3		0.000		P
Sodium	21.7		-27.0		-25.0		-27.0		0.000		P
Strontium	0.7	J	0.5	J	0.6	J	0.6	J	0.000		P
Thallium	0.8	J	0.2		0.2		0.2		0.000		P
Tin	0.5		0.2		0.2		0.2		1.189		P
Titanium	0.5	J	0.3		0.3		0.3		0.000		P
Vanadium	0.6	J	0.4		0.3		0.3		0.000		P
Zinc	-0.9		-2.5		-2.6		-2.6		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): SOIL

Run: ICPMS02 080219A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	0.3		0.6		0.5		0.4		0.000		P
Arsenic	0.5		0.4		0.6		0.6		0.000		P
Barium	0.4		0.6		0.6	J	1.6	J	0.000		P
Beryllium	0.6	J	0.6	J	0.5	J	0.4	J	0.041		P
Boron	12.1	J	13.9	J	2.2		0.6		0.694		P
Cadmium	0.3	J	0.6	J	0.5	J	0.4	J	0.043		P
Calcium	-25.4		9.0		110.0	J	219.0	J	0.000		P
Chromium	0.3		0.3		0.3		0.3		0.094		P
Cobalt	0.1	J	0.2	J	0.2	J	0.1	J	0.000		P
Copper	-0.1		-0.1		0.0		-0.1		0.000		P
Iron	37.6	J	43.4	J	61.4	J	127.0	J	0.000		P
Lead	0.5	J	0.2	J	0.1		0.3	J	0.000		P
Magnesium	13.6		57.4	J	57.2	J	68.5	J	3.905		P
Manganese	0.3		0.2		0.6		2.1	J	0.000		P
Molybdenum	0.4		0.7		0.3		0.3		0.000		P
Nickel	0.1		-0.1		-0.2		-0.2		0.000		P
Potassium	37.7	J	79.3	J	66.5	J	66.5	J	6.417		P
Selenium	0.2		0.4		0.7		0.0		0.000		P
Silver	0.1		0.4	J	0.2		0.2		0.000		P
Sodium	21.7		57.9	J	46.5	J	36.6	J	0.000		P
Strontium	0.7	J	0.7	J	1.1	J	1.6	J	0.000		P
Thallium	0.8	J	0.9	J	0.5	J	0.2		0.000		P
Tin	0.5		0.6	J	0.5		0.4		1.189		P
Titanium	0.5	J	0.8	J	1.3	J	1.7	J	0.000		P
Vanadium	0.6	J	0.3		0.4		0.6	J	0.000		P
Zinc	-0.9		-1.6		-1.2		-0.9		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): SOIL

Run: ICPMS02 080219A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
		C	1	C	2	C	3	C		C	
Antimony	0.3		0.5						0.000		P
Arsenic	0.5		0.4						0.000		P
Barium	0.4		1.0	J					0.000		P
Beryllium	0.6	J	0.4	J					0.041		P
Boron	12.1	J	1.3						0.694		P
Cadmium	0.3	J	0.5	J					0.043		P
Calcium	-25.4		94.1	J					0.000		P
Chromium	0.3		0.2						0.094		P
Cobalt	0.1	J	0.2	J					0.000		P
Copper	-0.1		0.0						0.000		P
Iron	37.6	J	65.3	J					0.000		P
Lead	0.5	J	0.1						0.000		P
Magnesium	13.6		56.6	J					3.905		P
Manganese	0.3		0.9						0.000		P
Molybdenum	0.4		0.3						0.000		P
Nickel	0.1		-0.1						0.000		P
Potassium	37.7	J	65.6	J					6.417		P
Selenium	0.2		0.4						0.000		P
Silver	0.1		0.2						0.000		P
Sodium	21.7		43.4	J					0.000		P
Strontium	0.7	J	1.1	J					0.000		P
Thallium	0.8	J	0.2						0.000		P
Tin	0.5		0.4						1.189		P
Titanium	0.5	J	1.1	J					0.000		P
Vanadium	0.6	J	0.5	J					0.000		P
Zinc	-0.9		-0.4						0.000		P

Note: MDLs are used, not IDLs

FORM III - IN



3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): SOIL

Run: ICPMS02 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	2.1	J	1.9	J	-1.3		-1.8		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): SOIL

Run: ICPMS02 080220A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Aluminum	2.1	J	4.5	J	-2.0		-1.3		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): WATER

Run: ICPMS02 080220A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
		C	1	C	2	C	3	C		C	
Antimony	0.3		-0.3		-0.3		-0.4		0.000		P
Arsenic	0.0		-0.2		0.0		-0.2		0.000		P
Barium	0.4		-0.1		-0.2		-0.2		0.000		P
Beryllium	0.3		-0.4		-0.3		-0.4		0.000		P
Boron	6.0		-7.5		-9.3		-9.9		0.000		P
Cadmium	0.2	J	-0.4		-0.4		-0.5		0.000		P
Calcium	-0.6		-73.0		-81.0		-85.0		0.000		P
Chromium	-0.2		0.0		1.3	J	1.4	J	0.000		P
Cobalt	-0.3		-0.5		-0.5		-0.5		0.000		P
Copper	-0.5		-0.7		-0.6		-0.5		0.000		P
Iron	30.5	J	-19.0		-16.0		-17.0		0.000		P
Lead	0.3	J	-0.3		-0.3		-0.4		0.000		P
Magnesium	75.5	J	9.5		8.8		5.4		0.000		P
Manganese	0.0		-0.3		-0.2		-0.2		0.000		P
Molybdenum	0.5		-0.3		-0.3		-0.3		0.000		P
Nickel	0.1		-0.4		0.3	J	0.4	J	0.000		P
Potassium	30.3	J	-17.0		-24.0		-27.0		0.000		P
Selenium	0.8		1.4		1.9	J	1.8	J	0.000		P
Silver	0.4	J	-0.3		-0.3		-0.3		0.000		P
Sodium	70.1	J	13.6		6.8		3.8		0.000		P
Strontium	0.8	J	0.2		0.1		0.1		0.000		P
Thallium	0.4	J	-0.2		-0.2		-0.3		0.000		P
Tin	0.5		-0.2		-0.2		-0.2		0.000		P
Titanium	0.8	J	0.2		0.2		0.2		0.000		P
Vanadium	0.0		-0.1		-0.2		-0.2		0.000		P
Zinc	-0.3		-0.8		-0.3		-0.2		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): WATER

Run: ICPMS02 080220A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial	Continuing Calibration						Prepa-	C	M
	Calib. Blank (ug/L)	C	1	C	2	C	3	C		
Antimony	0.3		-0.3		-0.3		-0.4		0.000	P
Arsenic	0.0		-0.1		0.0		-0.1		0.000	P
Barium	0.4		0.0		0.0		-0.1		0.000	P
Beryllium	0.3		-0.3		-0.4		-0.4		0.000	P
Boron	6.0		-8.0		-10.0		-4.9		0.000	P
Cadmium	0.2 J		-0.4		-0.5		-0.4		0.000	P
Calcium	-0.6		-54.0		126.0 J		-26.0		0.000	P
Chromium	-0.2		1.4 J		1.9 J		1.4 J		0.000	P
Cobalt	-0.3		-0.5		-0.5		-0.5		0.000	P
Copper	-0.5		-0.5		-0.6		-0.4		0.000	P
Iron	30.5 J		-12.0		-12.0		-11.0		0.000	P
Lead	0.3 J		-0.3		-0.4		-0.3		0.000	P
Magnesium	75.5 J		14.5		94.3 J		35.5 J		0.000	P
Manganese	0.0		-0.1		0.6		0.1		0.000	P
Molybdenum	0.5		-0.3		-0.3		-0.3		0.000	P
Nickel	0.1		0.4 J		0.3 J		0.3		0.000	P
Potassium	30.3 J		-30.0		-13.0		-9.7		0.000	P
Selenium	0.8		1.7 J		1.0		1.5		0.000	P
Silver	0.4 J		-0.3		-0.4		-0.3		0.000	P
Sodium	70.1 J		17.3		379.0		294.0		0.000	P
Strontium	0.8 J		0.5 J		2.4 J		0.8 J		0.000	P
Thallium	0.4 J		-0.2		-0.3		-0.3		0.000	P
Tin	0.5		-0.2		-0.3		-0.2		0.000	P
Titanium	0.8 J		0.3		0.2		0.2		0.000	P
Vanadium	0.0		-0.1		-0.3		-0.3		0.000	P
Zinc	-0.3		-0.3		-0.3		0.0		0.000	P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): WATER

Run: ICPMS02 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)	Continuing Calibration Blank (ug/L)						Prepa- ration Blank	C	M
	C	1	C	2	C	3	C	C		
Aluminum	-3.5	-2.8		-2.9		-3.4		0.000		P
Antimony	-0.5	-0.4		-0.6		-0.6		0.000		P
Arsenic	-0.4	-0.7		-0.8		-0.9		0.000		P
Barium	-0.4	-0.4		-0.3		-0.3		0.000		P
Beryllium	-0.3	-0.1		-0.2		-0.2		0.000		P
Boron	9.4	9.5		3.4		-2.2		0.000		P
Cadmium	-0.6	-0.3		-0.4		-0.4		0.000		P
Calcium	-36.2	-30.0		-23.0		-38.0		0.000		P
Chromium	-0.5	-0.8		-0.8		-0.7		0.000		P
Cobalt	-0.6	-0.8		-0.8		-0.8		0.000		P
Copper	-1.3	-1.1		-1.1		-1.1		0.000		P
Iron	-49.6	-62.0		-63.0		-79.0		0.000		P
Lead	-0.4	-0.2		-0.2		-0.3		0.000		P
Magnesium	-89.2	-210.0		-290.0		-330.0		0.000		P
Manganese	-0.7	-0.7		-0.8		-0.8		0.000		P
Molybdenum	-0.2	-0.4		-0.5		-0.5		0.000		P
Nickel	-0.7	-0.6		-0.6		-0.7		0.000		P
Potassium	-50.8	-53.0		-57.0		-70.0		0.000		P
Selenium	-0.2	0.1		-0.1		-0.6		0.000		P
Silver	-0.8	-0.6		-0.6		-0.6		0.000		P
Sodium	-59.0	-61.0		764.0		257.0		0.000		P
Strontium	0.3	0.5 J		0.6 J		0.5 J		0.000		P
Thallium	-0.4	-0.2		-0.2		-0.3		0.000		P
Tin	-0.4	-0.2		-0.3		-0.3		0.000		P
Titanium	-0.2	-0.2		-0.2		-0.3		0.000		P
Vanadium	-0.3	-0.5		-0.5		-0.5		0.000		P
Zinc	-3.5	-0.6		-0.8		-0.8		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): WATER

Run: ICPMS02 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial	Continuing Calibration						Prepa-	C	M
	Calib. Blank (ug/L)	Blank (ug/L)						ration Blank		
		1	C	2	C	3	C			
Aluminum	-3.5	-2.6		-2.7		-2.6		0.000		P
Antimony	-0.5	-0.1		-0.5		-0.5		0.000		P
Arsenic	-0.4	-0.1		-0.1		-0.1		0.000		P
Barium	-0.4	-0.1		0.2		-0.3		0.000		P
Beryllium	-0.3	0.1		0.1		0.0		0.000		P
Boron	9.4	12.4	J	-0.3		-1.5		0.000		P
Cadmium	-0.6	0.0		-0.2		-0.2		0.000		P
Calcium	-36.2	85.8	J	82.4	J	68.4		0.000		P
Chromium	-0.5	-0.2		-0.3		-0.3		0.000		P
Cobalt	-0.6	-0.3		-0.3		-0.3		0.000		P
Copper	-1.3	-0.7		-0.7		-0.7		0.000		P
Iron	-49.6	-25.0		-26.0		-36.0		0.000		P
Lead	-0.4	-0.1		-0.2		-0.2		0.000		P
Magnesium	-89.2	-66.0		-75.0		-84.0		0.000		P
Manganese	-0.7	-0.4		-0.4		-0.4		0.000		P
Molybdenum	-0.2	0.0		1.1		-0.3		0.000		P
Nickel	-0.7	-0.4		-0.5		-0.5		0.000		P
Potassium	-50.8	-15.0		-19.0		-21.0		0.000		P
Selenium	-0.2	0.0		0.1		-0.5		0.000		P
Silver	-0.8	-0.4		-0.6		-0.6		0.000		P
Sodium	-59.0	-440.0		-140.0		-450.0		0.000		P
Strontium	0.3	0.6	J	0.5	J	0.4	J	0.000		P
Thallium	-0.4	0.1		-0.1		-0.1		0.000		P
Tin	-0.4	0.1		-0.1		-0.1		0.000		P
Titanium	-0.2	-0.1		-0.2		-0.2		0.000		P
Vanadium	-0.3	-0.1		-0.1		-0.3		0.000		P
Zinc	-3.5	-0.3		-1.2		22.3		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): WATER

Run: ICPMS02 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial Calib. Blank (ug/L)	Continuing Calibration Blank (ug/L)						Prepa- ration Blank	C	M
	C	1	C	2	C	3	C	C		
Aluminum	-3.5	-2.8		-2.2		0.4		0.000		P
Antimony	-0.5	-0.5		-0.4		-0.4		0.000		P
Arsenic	-0.4	0.0		0.0		0.5		0.000		P
Barium	-0.4	-0.3		0.5		0.0		0.000		P
Beryllium	-0.3	0.0		0.1		0.0		0.000		P
Boron	9.4	-2.2		4.1		-0.3		0.000		P
Cadmium	-0.6	-0.2		-0.1		-0.2		0.000		P
Calcium	-36.2	94.0 J		234.0 J		448.0 J		0.000		P
Chromium	-0.5	-0.2		-0.3		-0.3		0.000		P
Cobalt	-0.6	-0.3		-0.3		-0.3		0.000		P
Copper	-1.3	-0.7		-0.7		0.0		0.000		P
Iron	-49.6	-35.0		-22.0		-17.0		0.000		P
Lead	-0.4	-0.2		-0.1		-0.1		0.000		P
Magnesium	-89.2	-83.0		-43.0		-24.0		0.000		P
Manganese	-0.7	-0.3		-0.1		-0.3		0.000		P
Molybdenum	-0.2	-0.3		-0.2		6.5		0.000		P
Nickel	-0.7	-0.5		-0.4		0.0		0.000		P
Potassium	-50.8	-19.0		-9.6		1.8		0.000		P
Selenium	-0.2	0.3		0.9		0.7		0.000		P
Silver	-0.8	-0.6		-0.5		-0.6		0.000		P
Sodium	-59.0	-520.0		-320.0		-540.0		0.000		P
Strontium	0.3	0.6 J		1.1 J		0.8 J		0.000		P
Thallium	-0.4	-0.1		0.1		-0.1		0.000		P
Tin	-0.4	-0.2		0.0		-0.1		0.000		P
Titanium	-0.2	-0.2		-0.1		-0.1		0.000		P
Vanadium	-0.3	-0.1		-0.1		-0.2		0.000		P
Zinc	-3.5	17.4		5.3		6.2		0.000		P

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): WATER

Run: ICPMS02 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial	Continuing Calibration						Prepa-	C	M
	Calib. Blank (ug/L)	Blank (ug/L)						ration Blank		
		1	C	2	C	3	C			
Aluminum	-3.5	-3.4		63.9		15.8		0.000		P
Antimony	-0.5	0.0		-0.4		-0.3		0.000		P
Arsenic	-0.4	-0.4		-0.1		-0.3		0.000		P
Barium	-0.4	-0.6		0.0		-0.5		0.000		P
Beryllium	-0.3	-0.2		-0.4		-0.5		0.000		P
Boron	9.4	11.1	J	-2.7		-4.8		0.000		P
Cadmium	-0.6	-0.4		-0.7		-0.6		0.000		P
Calcium	-36.2	-78.0		173.0	J	21.5		0.000		P
Chromium	-0.5	-0.3		-0.3		-0.2		0.000		P
Cobalt	-0.6	-0.3		-0.3		-0.3		0.000		P
Copper	-1.3	-0.6		-0.4		0.1		0.000		P
Iron	-49.6	-80.0		-7.9		-65.0		0.000		P
Lead	-0.4	-0.5		-0.7		-0.6		0.000		P
Magnesium	-89.2	-86.0		-69.0		-95.0		0.000		P
Manganese	-0.7	-0.3		1.0		0.0		0.000		P
Molybdenum	-0.2	-0.2		19.2		15.8		0.000		P
Nickel	-0.7	-0.8		-1.0		-0.5		0.000		P
Potassium	-50.8	-62.0		-84.0		-45.0		0.000		P
Selenium	-0.2	0.2		-0.1		0.0		0.000		P
Silver	-0.8	-0.5		-0.8		-0.8		0.000		P
Sodium	-59.0	-70.0		43.9	J	38.0	J	0.000		P
Strontium	0.3	0.3		0.8	J	0.6	J	0.000		P
Thallium	-0.4	-0.2		-0.5		-0.5		0.000		P
Tin	-0.4	-0.4		-0.7		-0.7		0.000		P
Titanium	-0.2	-0.7		-0.6		-0.7		0.000		P
Vanadium	-0.3	-0.1		-0.1		-0.2		0.000		P
Zinc	-3.5	-3.2		-3.0		2.3	J	0.000		P

Note: MDLs are used, not IDLs

FORM III - IN



3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): WATER

Run: ICPMS02 080221A

Preparation Blank Concentration Units (ug/L or mg/kg):

Analyte	Initial	Continuing Calibration						Prepa-	C	M
	Calib. Blank (ug/L)	C	1	C	2	C	3	C		
Aluminum	-3.5		-0.1		-1.3		1.1		0.000	P
Antimony	-0.5		-0.3		-0.3		-0.4		0.000	P
Arsenic	-0.4		-0.6		-0.5		-0.5		0.000	P
Barium	-0.4		-0.4		-0.4		-0.6		0.000	P
Beryllium	-0.3		-0.4		-0.4		-0.4		0.000	P
Boron	9.4		2.3		-3.4		-4.0		0.000	P
Cadmium	-0.6		-0.6		-0.7		-0.7		0.000	P
Calcium	-36.2		-46.0		-32.0		-62.0		0.000	P
Chromium	-0.5		-0.3		-0.3		-0.3		0.000	P
Cobalt	-0.6		-0.3		-0.4		-0.4		0.000	P
Copper	-1.3		0.1		0.1		0.0		0.000	P
Iron	-49.6		-89.0		-91.0		-83.0		0.000	P
Lead	-0.4		-0.6		-0.7		-0.7		0.000	P
Magnesium	-89.2		-110.0		-120.0		-120.0		0.000	P
Manganese	-0.7		-0.3		-0.3		-0.3		0.000	P
Molybdenum	-0.2		8.3		7.3		7.2		0.000	P
Nickel	-0.7		-0.5		-0.5		-0.6		0.000	P
Potassium	-50.8		-73.0		-68.0		-73.0		0.000	P
Selenium	-0.2		0.2		0.5		0.8		0.000	P
Silver	-0.8		-0.7		-0.8		-0.8		0.000	P
Sodium	-59.0		-69.0		-67.0		-120.0		0.000	P
Strontium	0.3		0.3		0.3		0.2		0.000	P
Thallium	-0.4		-0.3		-0.5		-0.5		0.000	P
Tin	-0.4		-0.6		-0.7		-0.7		0.000	P
Titanium	-0.2		-0.6		-0.8		-0.6		0.000	P
Vanadium	-0.3		-0.1		-0.2		-0.3		0.000	P
Zinc	-3.5		0.7		0.6		0.6		0.000	P

Note: MDLs are used, not IDLs

FORM III - IN

Last Calib: Feb 28, 2008 03:56 pm  
 Calibration Type: External Calibration Method  
 Calibration Title: ICP\_ORG  
 Weighing Method: 1/(SD\*SD)  
 Mass Interpolation Fit for VIS: Point to Point  
 Method: C:\ICPCHEM\1\METHODS\ICP\_LI.M  
 Multi Tune: #1 022708a1.u  
 #2 051107ha.u

== Standard Files ==

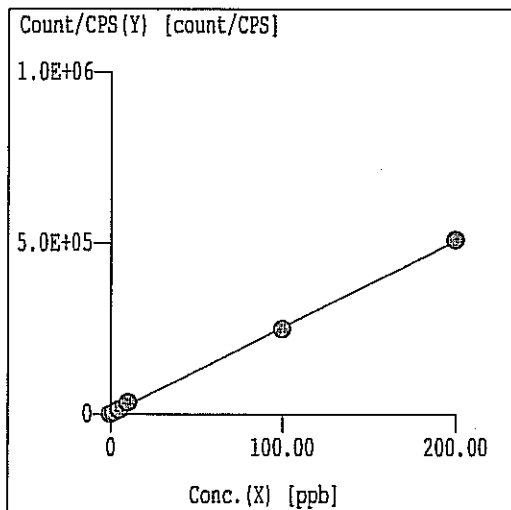
<Data Correction>

Bkg File: ---  
 Rejected Masses: ---  
 Interference Correction: OFF

	Data File	Sample Name	Date Acquired
1	c:\icpchem\1\data\08b27m00.b\002calb.d	CAL BLK	Feb 27 2008 12:09 pm
2	c:\icpchem\1\data\08b27m00.b\003cals.d	2/10/200	Feb 27 2008 12:12 pm
3	c:\icpchem\1\data\08b27m00.b\004cals.d	5/25/500	Feb 27 2008 12:16 pm
4	c:\icpchem\1\data\08b27m00.b\005cals.d	10/50/1000	Feb 27 2008 12:19 pm
5	c:\icpchem\1\data\08b27m00.b\006cals.d	100/500/10K	Feb 27 2008 12:22 pm
6	c:\icpchem\1\data\08b27m00.b\007cals.d	200/1000/20K	Feb 27 2008 12:26 pm
7	---		
8	---		
9	---		
10	---		
11	---		
12	---		
13	---		
14	---		
15	---		
16	---		
17	---		
18	---		
19	---		
20	---		

## === Graph Detail ===

Step Mass Element      ISTD      Unit  
 (1) 7 Li                    ---      ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-6.876E-01	117.8		P 7.122
2		2.000	1.407	5415		P 2.586
3		5.000	4.661	1.364E+04		P 1.798
4		10.00	12.84	3.434E+04		P 2.868E-01
5		100.0	97.81	2.492E+05		P 1.395
6		200.0	201.0	5.101E+05		P 5.519E-01
7						
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:       $Y=aX+b$   
 $r = 0.9998$   
 $Y = 2.529E+003 \cdot X + 1.857E+003$   
 $X = 3.954E-004 \cdot Y - 7.342E-001$   
 DL = 9.951E-03 ppb  
 BEC = 7.342E-01 ppb

Weight: OFF  
 Min Conc: 0.000

Last Calib: Feb 28, 2008 03:22 am  
 Calibration Type: External Calibration Method  
 Calibration Title: ICP\_ORS  
 Weighting Method: 1/(SD\*SD)  
 Mass Interpolation Fit for VIS: Point to Point  
 Method: C:\ICPCHEM\1\METHODS\ICP\_ORS.M  
 Multi Tune: #1 022208a5.u  
 #2 022208h1.u

## === Standard Files ===

## &lt;Data Correction&gt;

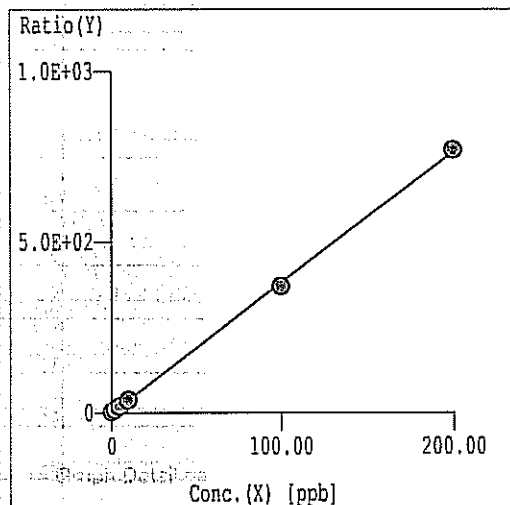
Bkg File: —  
 Rejected Masses: —  
 Interference Correction: ON

	Data File	Sample Name	Date Acquired
1	c:\icpchem\1\data\08b19\00.b\003calb.d\003calb.d#	CAL BLK	Feb 19 2008 11:29 am
2	c:\icpchem\1\data\08b19\00.b\004cals.d\004cals.d#	2/10/200	Feb 19 2008 11:35 am
3	c:\icpchem\1\data\08b19\00.b\005cals.d\005cals.d#	5/25/500	Feb 19 2008 11:41 am
4	c:\icpchem\1\data\08b19\00.b\006cals.d\006cals.d#	10/50/1000	Feb 19 2008 11:48 am
5	c:\icpchem\1\data\08b19\00.b\007cals.d\007cals.d#	100/500/10000	Feb 19 2008 11:54 am
6	c:\icpchem\1\data\08b19\00.b\008cals.d\008cals.d#	200/1000/20000	Feb 19 2008 12:00 pm
7	—		
8	—		
9	—		
10	—		
11	—		
12	—		
13	—		
14	—		
15	—		
16	—		
17	—		
18	—		
19	—		
20	—		

## === Graph Detail ===

Step Mass Element  
(1) 9 Be

ISTD 6 Unit  
ppb



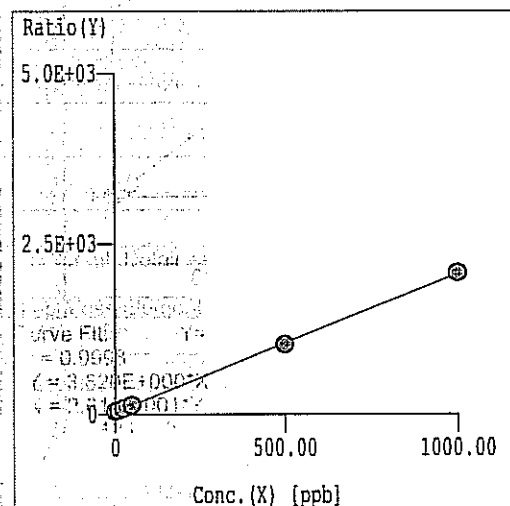
Curve Fit:  $Y=aX+b$   
 $r = 0.9998$   
 $Y = 3.820E+000 \cdot X - 6.728E-001$   
 $X = 2.618E-001 \cdot Y + 1.761E-001$   
 $DL = 1.124 \text{ ppb}$   
 $BEC = -1.761E-01 \text{ ppb}$

R/jct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	7.564E-01	537.8	2.216E+00	P 64.59
2	2.000	2.543	2226	9.042E+00	P 20.25
3	5.000	5.147	4606	1.899E+01	P 3.258
4	10.00	10.07	9113	3.778E+01	P 4.462
5	100.0	97.00	8.785E+04	3.698E+02	P 3.928E-01
6	200.0	201.5	1.807E+05	7.689E+02	P 7.748E-01
7	X 8.000E-01				
8					
9					
10					
11					
12					
13					
14					
15					
16					
17					
18					
19					
20					

Weight: OFF  
Min Conc: 0.000

Step Mass Element  
(1) 11 B

ISTD 6 Unit  
ppb



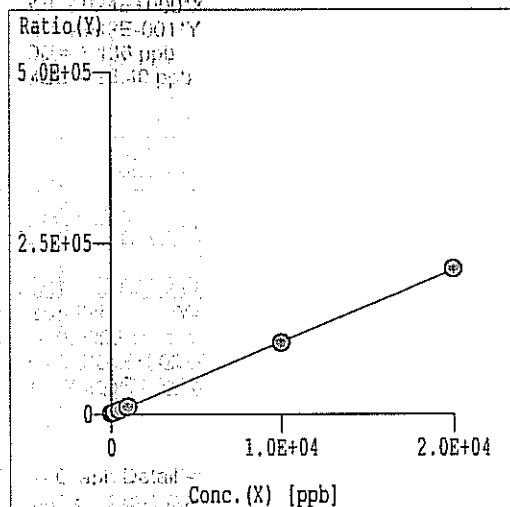
Curve Fit:  $Y=aX+b$   
 $r = 0.9999$   
 $Y = 2.024E+000 \cdot X + 3.318E+001$   
 $X = 4.942E-001 \cdot Y - 1.640E+001$   
 $DL = 1.136 \text{ ppb}$   
 $BEC = 16.40 \text{ ppb}$

R/jct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	3.158	9606	3.957E+01	P 1.936
2	10.00	11.70	1.398E+04	5.686E+01	P 7.665E-01
3	25.00	26.07	2.085E+04	8.594E+01	P 1.464
4	50.00	50.44	3.262E+04	1.352E+02	P 3.594
5	500.0	487.4	2.422E+05	1.019E+03	P 8.473E-01
6	1000	1006	4.865E+05	2.069E+03	P 2.015
7	X 4.000				
8					
9					
10					
11					
12					
13					
14					
15					
16					
17					
18					
19					
20					

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 23 Na                72     ppb

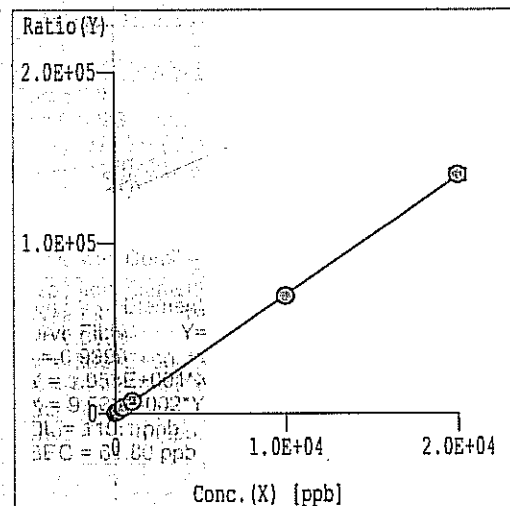


	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	57.99	5.217E+05	1.261E+03	M 33.13
2		200.0	229.7	1.287E+06	3.069E+03	A 12.35
3		500.0	511.7	2.524E+06	6.037E+03	A 3.545
4		1000	986.1	4.587E+06	1.103E+04	A 2.861
5		1.000E+04	9829	4.260E+07	1.041E+05	A 6.214E-01
6		2.000E+04	2.009E+04	8.734E+07	2.121E+05	A 2.228
7	X	80.00				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit: Na      Y=aX+b  
r = 0.9999  
Y = 1.053E+001\*X + 6.505E+002  
X = 9.500E-002\*Y - 6.180E+001  
DL = 119.1 ppb  
BEC = 61.80 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 24 Mg                72     ppb



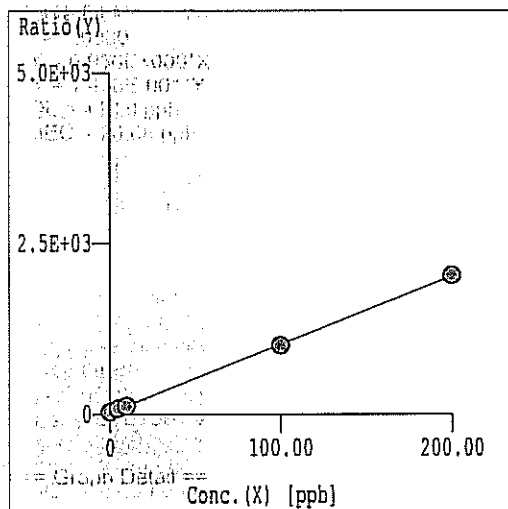
	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	34.87	1.774E+05	4.282E+02	M 60.04
2		200.0	215.7	7.072E+05	1.686E+03	M 13.53
3		500.0	504.7	1.546E+06	3.697E+03	A 1.121
4		1000	1008	2.993E+06	7.197E+03	A 2.939
5		1.000E+04	9875	2.818E+07	6.888E+04	A 1.177
6		2.000E+04	2.006E+04	5.755E+07	1.397E+05	A 2.425
7	X	80.00				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit: Mg      Y=aX+b  
r = 1.0000  
Y = 6.956E+000\*X + 1.856E+002  
X = 1.438E-001\*Y - 2.668E+001  
DL = 110.9 ppb  
BEC = 26.68 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 27 Al                72     ppb



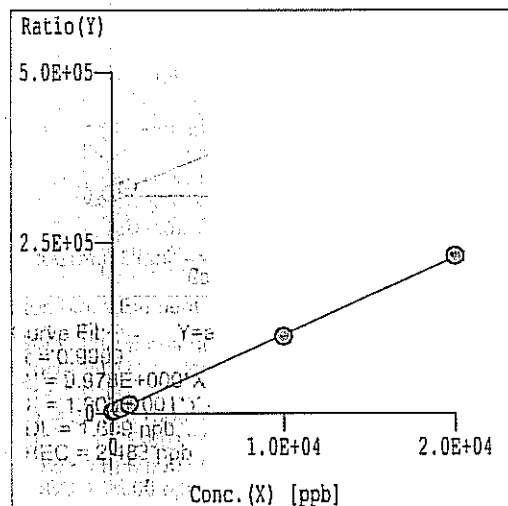
	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	5.095E-01	1.235E+04	2.986E+01	P 17.93
2	X	2.000		1.867E+04	4.453E+01	P 13.31
3		5.000	5.761	3.439E+04	8.226E+01	P 5.282
4		10.00	9.629	5.026E+04	1.208E+02	P 4.084
5		100.0	98.20	4.111E+05	1.005E+03	P 1.536
6		200.0	200.9	8.357E+05	2.029E+03	P 1.882
7	X	8.000E-01				
8						
9						
10						
11						
12						
13						
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15						
16						
17						
18						
19						
20						

Top Mass Element  
Curve Fit: A       $Y=aX+b$   
 $r = 0.9999$   
 $Y = 9.978E+000*X + 2.477E+001$   
 $X = 1.002E-001*Y - 2.483E+000$   
DL = 1.609 ppb  
BEC = 2.483 ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
17.93  
13.31  
5.282  
4.084  
1.536  
1.882

Step Mass Element      ISTD    Unit  
(1) 39 K                72     ppb



	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	65.75	9.731E+05	2.352E+03	M 14.94
2		200.0	245.6	1.844E+06	4.397E+03	A 8.577
3		500.0	513.3	3.111E+06	7.440E+03	A 3.845E-01
4		1000	1001	5.402E+06	1.299E+04	A 2.107
5		1.000E+04	9750	4.601E+07	1.125E+05	A 2.578E-01
6		2.000E+04	2.012E+04	9.488E+07	2.304E+05	A 2.701
7	X	80.00				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

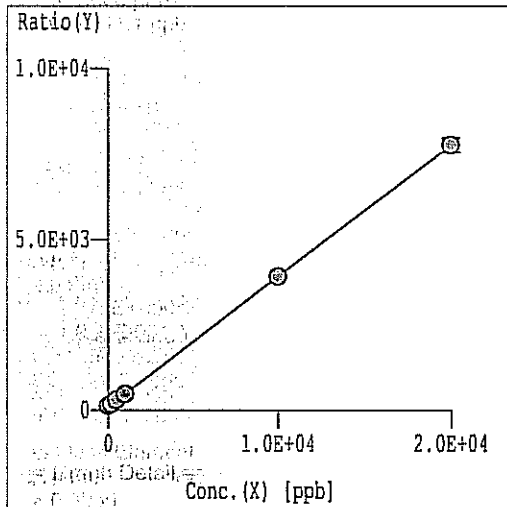
Top Mass Element  
Curve Fit: K       $Y=aX+b$   
 $r = 0.9999$   
 $Y = 1.137E+001*X + 1.604E+003$   
 $X = 8.795E-002*Y - 1.411E+002$   
DL = 92.70 ppb  
BEC = 141.1 ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
14.94  
8.577  
3.845E-01  
2.107  
2.578E-01  
2.701

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 44 Ca                72     ppb

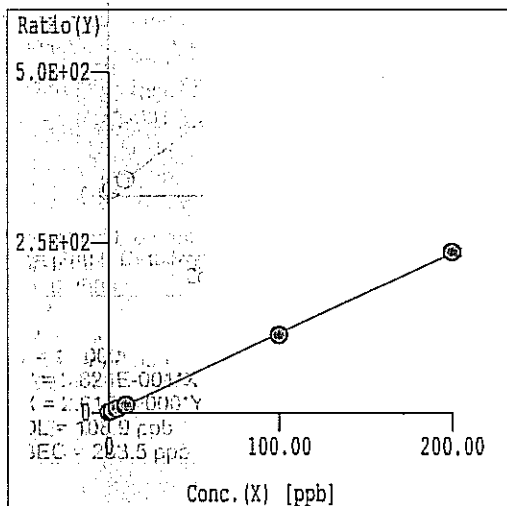


Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y_i = 3.824E-001 * X + 1.084E+002$   
 $X = 2.615E+000 * Y - 2.835E+002$   
 $DL = 108.9 \text{ ppb}$   
 $BEC = 283.5 \text{ ppb}$

	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	43.00	5.165E+04	1.249E+02	P 11.12
2		200.0	199.3	7.742E+04	1.847E+02	P 6.896
3		500.0	518.7	1.283E+05	3.068E+02	P 3.080
4		1000	952.2	1.965E+05	4.726E+02	P 2.845
5		1.000E+04	9970	1.604E+06	3.921E+03	A 9.574E-01
6		2.000E+04	2.002E+04	3.197E+06	7.763E+03	A 2.694
7	X	80.00				
8						
9						
10						
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12						
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19						
20						

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 47 Ti                72     ppb



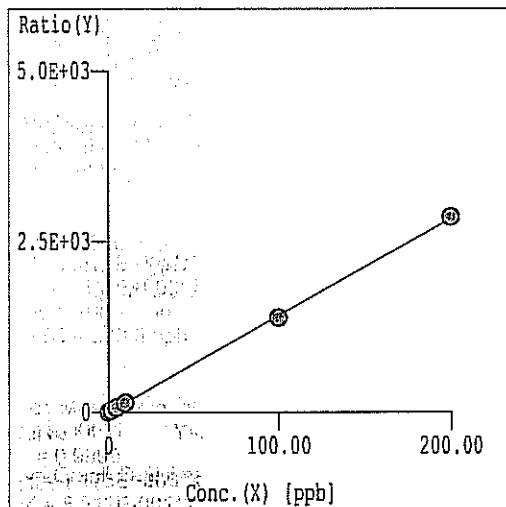
Curve Fit:  $Y = aX + b$   
 $r = 0.9999$   
 $Y_i = 1.175E+000 * X - 1.586E-001$   
 $X = 8.512E-001 * Y + 1.350E-001$   
 $DL = 4.326E-01 \text{ ppb}$   
 $BEC = -1.350E-01 \text{ ppb}$

	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	7.405E-01	294.5	7.114E-01	P 23.81
2		2.000	2.530	1180	2.814E+00	P 11.56
3		5.000	5.270	2522	6.033E+00	P 1.952
4		10.00	9.724	4685	1.127E+01	P 2.750
5		100.0	97.47	4.678E+04	1.144E+02	P 1.279
6		200.0	201.3	9.731E+04	2.363E+02	P 2.228
7	X	8.000E-01				
8						
9						
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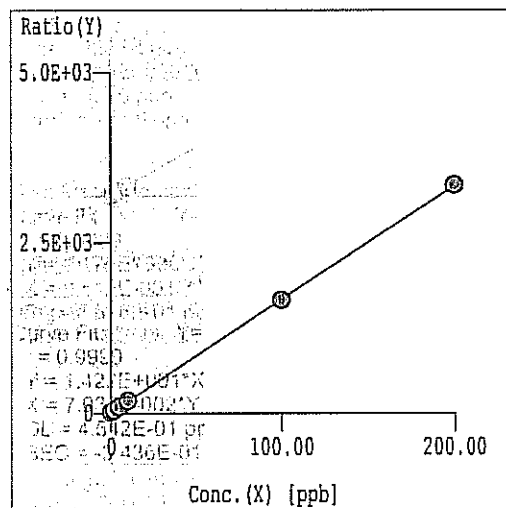
Weight: OFF  
Min Conc: 0.000



## Graph Detail

Step Mass Element  
(2) 51 VISTD Unit  
72 ppb

	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	4.824E-01	135.1	1.974E+00	P 109.0
2		2.000	2.372	2019	2.883E+01	P 17.09
3		5.000	5.276	4960	7.012E+01	P 2.793
4		10.00	10.16	9551	1.395E+02	P 2.419
5		100.0	97.46	9.481E+04	1.381E+03	P 6.792E-01
6		200.0	201.2	2.002E+05	2.856E+03	P 1.253
7	X	8.000E-01				
8						
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17						
18						
19						
20						

Weight: OFF  
Min Conc: 0.000Step Mass Element  
(2) 52 CrISTD Unit  
72 ppb

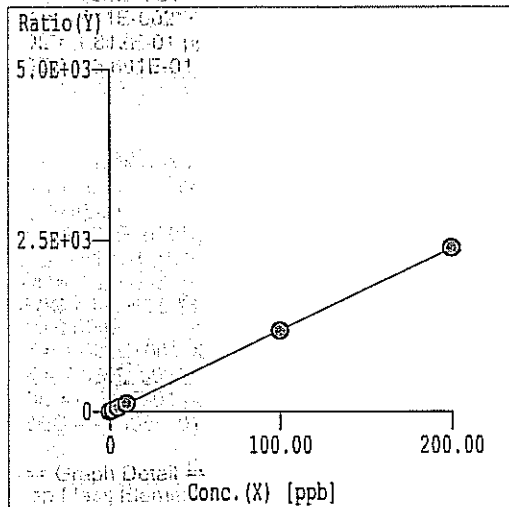
	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	1.645E-01	970.1	1.387E+01	P 7.247
2		2.000	2.036	3146	4.500E+01	P 3.076
3		5.000	5.003	6674	9.435E+01	P 3.529
4		10.00	10.31	1.250E+04	1.827E+02	P 3.646
5		100.0	99.00	1.139E+05	1.658E+03	P 8.928E-01
6		200.0	200.5	2.346E+05	3.346E+03	P 1.619
7	X	8.000E-01				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element

(2) 55 Mn

ISTD Unit  
72 ppb

Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	2.773E-01	186.7	2.673E+00	P 13.84
2	2.000	2.175	1768	2.527E+01	P 4.725
3	5.000	4.999	4165	5.890E+01	P 1.425
4	10.00	10.04	8144	1.189E+02	P 3.822
5	100.0	99.03	8.097E+04	1.179E+03	P 9.772E-01
6	200.0	200.5	1.674E+05	2.387E+03	P 1.659
7	X 8.000E-01				
8					
9					
10					
11					
12					
13					
14					
15					
16					
17					
18					
19					
20					

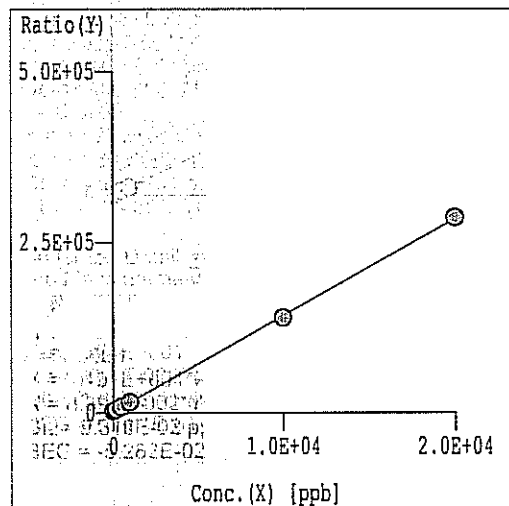
Curve Fit:  $Y=aX+b$  $r=1.0000$  $Y=1.191E+001*X-6.292E-001$  $X=8.396E-002*Y+5.282E-002$ 

DL=9.316E-02 ppb

BEC=-5.282E-02 ppb

Weight: OFF

Min Conc: 0.000

Step Mass Element  
(1) 56 FeISTD Unit  
72 ppb

Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	51.10	8.963E+05	2.165E+03	M 24.85
2	200.0	246.0	2.062E+06	4.918E+03	A 10.07
3	500.0	517.4	3.660E+06	8.752E+03	A 5.064E-01
4	1000	1010	6.535E+06	1.571E+04	A 8.507E-01
5	1.000E+04	9754	5.697E+07	1.392E+05	A 1.143
6	2.000E+04	2.012E+04	1.177E+08	2.857E+05	A 3.040E-01
7	X 80.00				
8					
9					
10					
11					
12					
13					
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16					
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18					
19					
20					

Step Mass Element

Curve Fit:  $Y=aX+b$  $r=0.9999$  $Y=1.413E+001*X+1.443E+003$  $X=7.078E-002*Y-1.021E+002$ 

DL=114.2 ppb

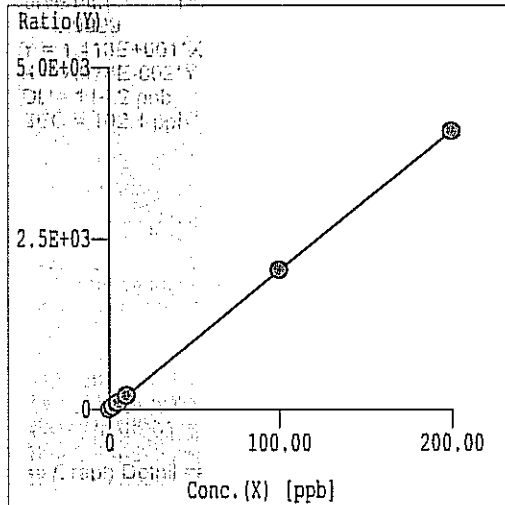
BEC=102.1 ppb

Weight: OFF

Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 59 Co                72    ppb

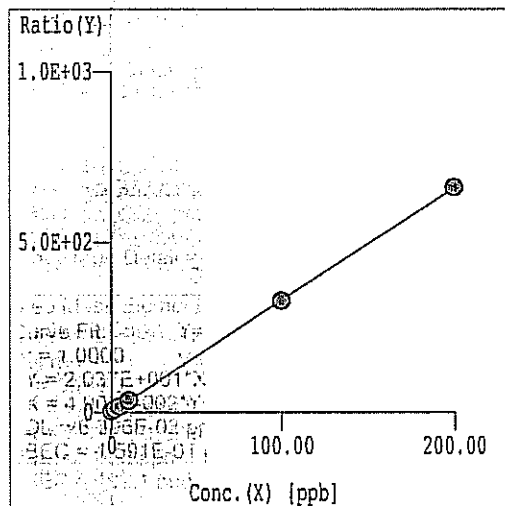


R/ct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	4.447E-02	290.0	4.148E+00	P 10.47
2	2.000	1.991	3060	4.380E+01	P 1.020
3	5.000	4.840	7201	1.018E+02	P 2.044
4	10.00	9.971	1.413E+04	2.064E+02	P 1.240
5	100.0	100.3	1.405E+05	2.047E+03	P 3.130E-01
6	200.0	199.9	2.857E+05	4.075E+03	P 1.555
7	X 8.000E-01				
8					
9					
10					
11					
12					
13					
14					
15					
16					
17					
18					
19					
20					

Step Mass Element  
Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 2.037E+001 * X + 3.242E+000$   
 $X = 4.909E-002 * Y - 1.591E-001$   
 $DL = 6.396E-02$  ppb  
 $BEC = 1.591E-01$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 60 Ni                72    ppb



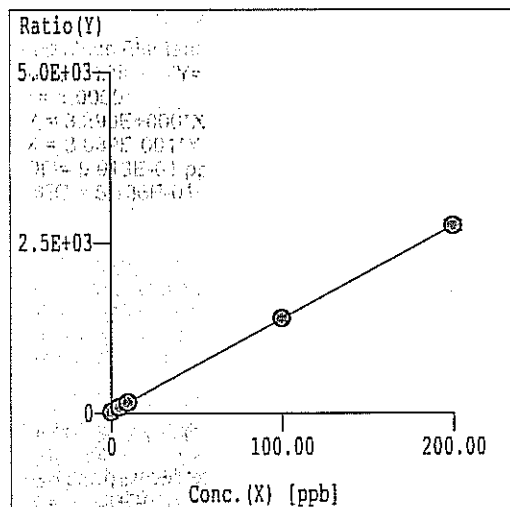
R/ct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	3.045E-01	1115	2.692E+00	P 40.39
2	2.000	2.225	3778	9.011E+00	P 11.04
3	5.000	4.905	7452	1.783E+01	P 7.441
4	10.00	10.02	1.441E+04	3.464E+01	P 1.864
5	100.0	99.10	1.341E+05	3.278E+02	P 1.809
6	200.0	200.4	2.723E+05	6.612E+02	P 9.985E-01
7	X 8.000E-01				
8					
9					
10					
11					
12					
13					
14					
15					
16					
17					
18					
19					
20					

Step Mass Element  
Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 3.290E+000 * X + 1.690E+000$   
 $X = 3.039E-001 * Y - 5.136E-001$   
 $DL = 9.913E-01$  ppb  
 $BEC = 5.136E-01$  ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 63 Cu                72    ppb

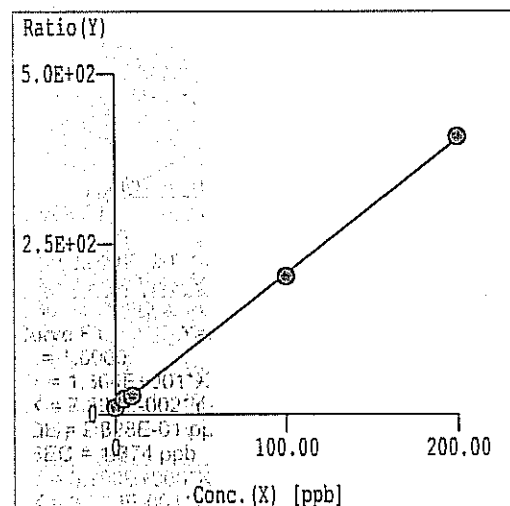


Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-2.536E-01	1451	2.073E+01	P 5.104
2	X 2.000	---	3527	5.048E+01	P 3.715
3	5.000	5.060	6583	9.319E+01	P 4.679
4	10.00	10.10	1.108E+04	1.619E+02	P 1.892
5	100.0	100.2	9.550E+04	1.391E+03	P 4.670E-01
6	200.0	199.9	1.928E+05	2.750E+03	P 2.731
7	X 8.000E-01	---	---	---	---
8	---	---	---	---	---
9	---	---	---	---	---
10	---	---	---	---	---
11	---	---	---	---	---
12	---	---	---	---	---
13	---	---	---	---	---
14	---	---	---	---	---
15	---	---	---	---	---
16	---	---	---	---	---
17	---	---	---	---	---
18	---	---	---	---	---
19	---	---	---	---	---
20	---	---	---	---	---

Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 1.364E+001 * X + 2.419E+001$   
 $X = 7.334E-002 * Y - 1.774E+000$   
 $DL = 2.328E-01$  ppb  
 $BEC = 1.774$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 66 Zn                72    ppb



Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	2.969E-01	3873	9.360E+00	P 8.113
2	X 2.000	---	5733	1.367E+01	P 8.758
3	5.000	6.695	9211	2.203E+01	P 8.738E-01
4	10.00	9.255	1.127E+04	2.710E+01	P 2.046
5	100.0	97.52	8.258E+04	2.018E+02	P 1.304
6	200.0	201.2	1.677E+05	4.072E+02	P 6.757E-01
7	X 8.000E-01	---	---	---	---
8	---	---	---	---	---
9	---	---	---	---	---
10	---	---	---	---	---
11	---	---	---	---	---
12	---	---	---	---	---
13	---	---	---	---	---
14	---	---	---	---	---
15	---	---	---	---	---
16	---	---	---	---	---
17	---	---	---	---	---
18	---	---	---	---	---
19	---	---	---	---	---
20	---	---	---	---	---

Step Mass Element  
Curve Fit:  $Y = aX + b$   
 $r = 0.9998$   
 $Y = 1.980E+000 * X + 8.772E+000$   
 $X = 5.051E-001 * Y - 4.431E+000$   
 $DL = 1.151$  ppb  
 $BEC = 4.431$  ppb

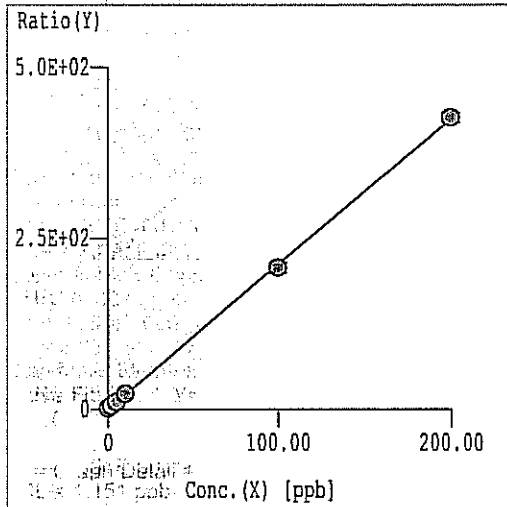
Weight: OFF  
Min Conc: 0.000

RSD [%]  
 3.00 P 8.113  
 3.00 P 8.758  
 1.01 P 8.738E-01  
 2.01 P 2.046  
 2.02 P 1.304  
 3.02 P 6.757E-01

=== Graph Detail ===

Line 1: 151 ppb

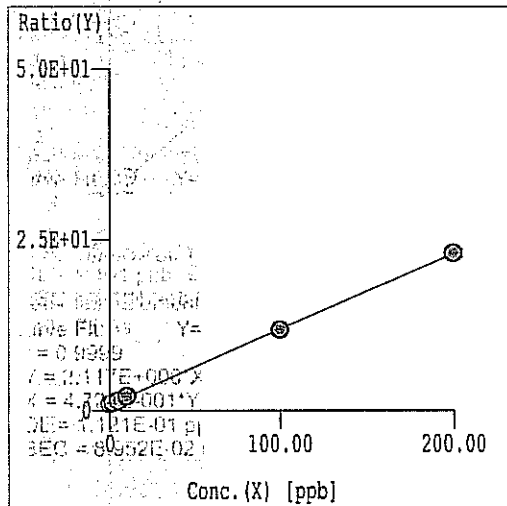
Step Mass Element      ISTD    Unit  
(2) 75 As                72    ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	4.281E-01	76.67	1.096E+00	P 7.221
2		2.000	2.247	345.6	4.947E+00	P 5.425
3		5.000	5.095	775.6	1.097E+01	P 4.347
4		10.00	10.49	1533	2.239E+01	P 4.565
5		100.0	97.54	1.419E+04	2.067E+02	P 3.479
6		200.0	201.2	2.987E+04	4.261E+02	P 1.706
7	X	8.000E-01				
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Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 82 Se                72    ppb

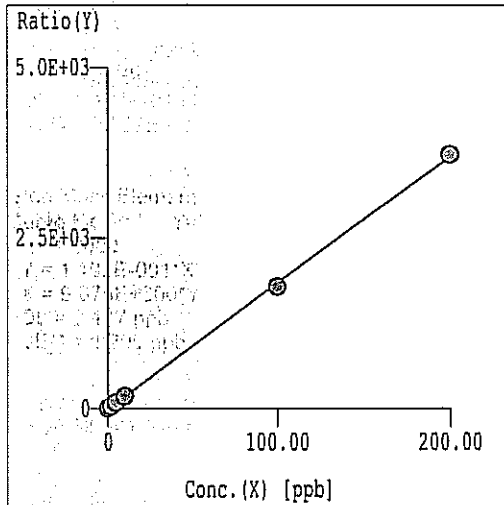


	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	3.809E-02	379.6	9.177E-01	P 8.715
2		2.000	2.453	496.3	1.184E+00	P 2.825
3		5.000	4.602	594.1	1.421E+00	P 4.924
4		10.00	10.58	864.8	2.079E+00	P 8.071
5		100.0	98.70	4824	1.179E+01	P 5.449E-01
6		200.0	200.6	9479	2.302E+01	P 2.316
7	X	8.000E-01				
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Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 88 Sr                72    ppb

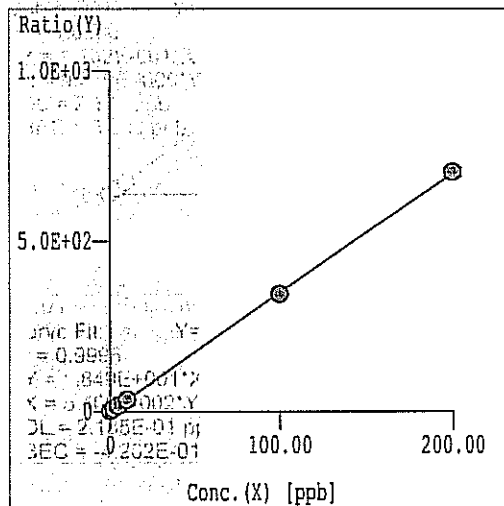


	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	6.440E-01	1710	4.136E+00	P 32.56
2		2.000	2.405	1.538E+04	3.669E+01	P 3.745
3		5.000	5.372	3.828E+04	9.155E+01	P 1.514
4		10.00	10.23	7.537E+04	1.813E+02	P 1.097
5		100.0	96.75	7.286E+05	1.781E+03	P 1.368
6		200.0	201.6	1.532E+06	3.719E+03	A 8.712E-01
7	X	8.000E-01				
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Curve Fit:  $Y = aX + b$   
 $r = 0.9998$   
 $Y = 1.849E+001 * X - 7.768E+000$   
 $X = 5.409E-002 * Y + 4.202E-001$   
 $DL = 2.185E-01$  ppb  
 $BEC = -4.202E-01$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 95 Mo                72    ppb



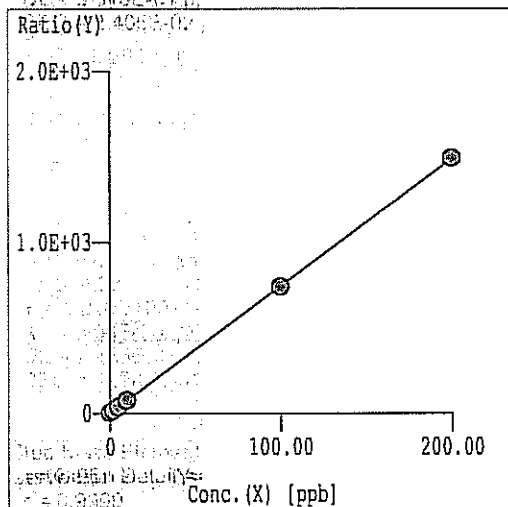
	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	5.397E-01	816.7	1.971E+00	P 55.08
2		2.000	2.304	3413	8.138E+00	P 12.54
3		5.000	4.944	7263	1.737E+01	P 2.210
4		10.00	10.00	1.458E+04	3.506E+01	P 1.961
5		100.0	98.42	1.408E+05	3.442E+02	P 2.203E-01
6		200.0	200.8	2.891E+05	7.021E+02	P 1.805
7	X	8.000E-01				
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Step Mass Element  
Curve Fit:  $Y = aX + b$   
 $r = 0.9999$   
 $Y = 3.496E+000 * X + 8.410E-002$   
 $X = 2.860E-001 * Y - 2.405E-002$   
 $DL = 9.316E-01$  ppb  
 $BEC = 2.405E-02$  ppb

Weight: OFF  
Min Conc: 0.000

Graph Detail  
r = 0.9999

Step Mass Element ISTD Unit  
(1) 109 Ag 72 ppb

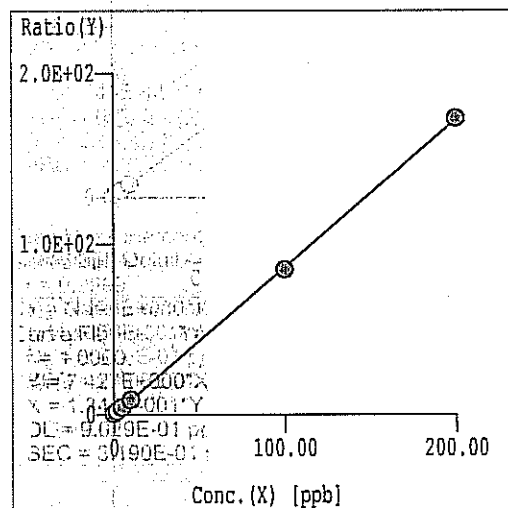


Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	2.766E-01	1831	4.423E+00	P 50.53
2	2.000	2.051	7380	1.760E+01	P 10.36
3	5.000	4.933	1.631E+04	3.900E+01	P 2.120
4	10.00	10.08	3.211E+04	7.723E+01	P 5.487E-01
5	100.0	99.32	3.028E+05	7.400E+02	P 6.148E-01
6	200.0	200.3	6.137E+05	1.490E+03	P 1.680
7	X 8.000E-01				
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Curve Fit:  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 7.427E+000 * X + 2.369E+000$   
 $X = 1.346E-001 * Y - 3.190E-001$   
 $DL = 9.029E-01$  ppb  
 $BEC = 3.190E-01$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element ISTD Unit  
(1) 111 Cd 115 ppb



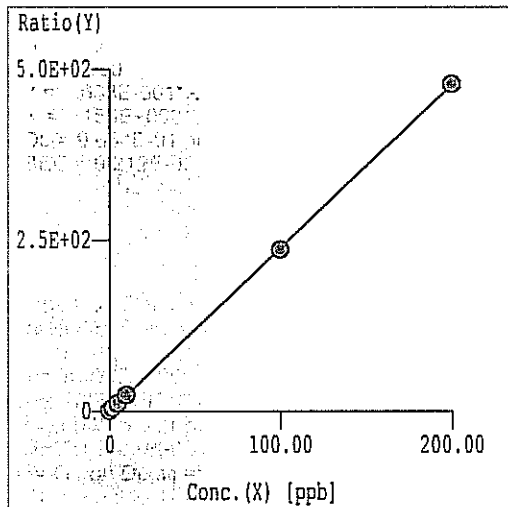
Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	4.528E-01	348.2	4.704E-01	P 59.05
2	2.000	2.299	1559	2.064E+00	P 17.79
3	5.000	5.064	3428	4.451E+00	P 2.119
4	10.00	10.06	6716	8.761E+00	P 2.610
5	100.0	98.27	6.384E+04	8.491E+01	P 5.625E-01
6	200.0	200.9	1.305E+05	1.735E+02	P 1.011
7	X 8.000E-01				
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Curve Fit:  $Y=aX+b$   
 $r = 0.9999$   
 $Y = 8.633E-001 * X + 7.952E-002$   
 $X = 1.158E+000 * Y - 9.212E-002$   
 $DL = 9.654E-01$  ppb  
 $BEC = 9.212E-02$  ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 118 Sn            115    ppb

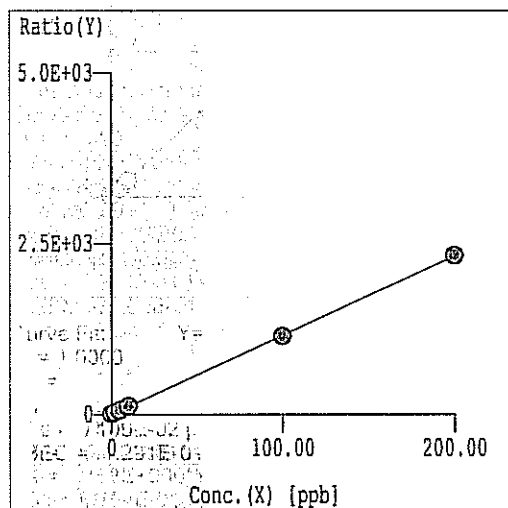


	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	2.230E-01	176.7	2.383E-01	P 30.39
2		2.000	2.166	3679	4.872E+00	P 3.876
3		5.000	5.104	9152	1.188E+01	P 9.750E-01
4		10.00	10.01	1.808E+04	2.359E+01	P 1.346E-01
5		100.0	99.00	1.773E+05	2.358E+02	P 1.289
6		200.0	200.5	3.595E+05	4.779E+02	P 1.084
7	X	8.000E-01				
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Curve Fit:  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 2.385E+000 * X - 2.936E-001$   
 $X = 4.193E-001 * Y + 1.231E-001$   
 $DL = 9.109E-02$  ppb  
 $BEC = 1.231E-01$  ppb

Weight: OFF  
 Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 121 Sb            72    ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	3.501E-01	376.7	5.392E+00	P 16.07
2		2.000	2.097	1788	2.561E+01	P 5.916
3		5.000	4.976	4165	5.894E+01	P 3.385
4		10.00	10.21	8182	1.195E+02	P 2.836
5		100.0	98.76	7.860E+04	1.145E+03	P 7.799E-01
6		200.0	200.6	1.629E+05	2.324E+03	P 5.584E-01
7	X	8.000E-01				
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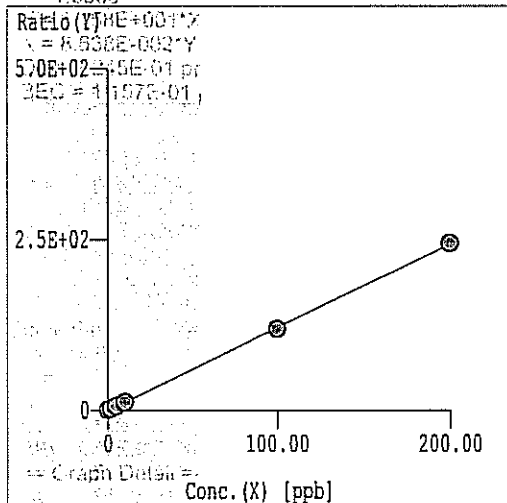
Curve Fit:  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 1.158E+001 * X + 1.340E+000$   
 $X = 8.638E-002 * Y - 1.157E-001$   
 $DL = 2.245E-01$  ppb  
 $BEC = 1.157E-01$  ppb

Weight: OFF  
 Min Conc: 0.000



## === Graph Detail ===

Step Mass Element  
(1) 137 Ba Y=  
= 1.0000



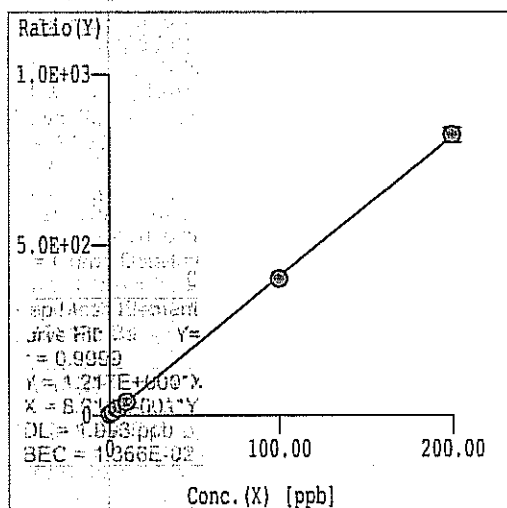
Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	6.204E-01	571.1	7.714E-01	P 57.47
2	2.000	2.327	2151	2.848E+00	P 13.71
3	5.000	5.079	4771	6.196E+00	P 4.192
4	10.00	9.997	9336	1.218E+01	P 2.438
5	100.0	97.96	8.961E+04	1.192E+02	P 2.725E-01
6	200.0	201.0	1.840E+05	2.446E+02	P 9.859E-01
7	X 8.000E-01				
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Step Mass Element  
Curve Fit Ba Y=aX+b  
r = 0.9999  
Y = 1.217E+000\*X + 1.663E-002  
X = 8.219E-001\*Y - 1.366E-002  
DL = 1.093 ppb  
BEC = 1.366E-02 ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
5.00 P 66.47  
2.00 P 13.71  
1.00 P 4.192  
0.50 P 2.438  
0.20 P 2.725E-01  
0.10 P 9.859E-01

Step Mass Element  
(1) 203 Tl ISTD Unit  
209 ppb



Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	7.046E-01	850.1	2.408E+00	P 62.11
2	2.000	2.339	3263	9.104E+00	P 12.94
3	5.000	5.147	7537	2.061E+01	P 4.423
4	10.00	9.792	1.459E+04	3.965E+01	P 2.761
5	100.0	98.03	1.427E+05	4.012E+02	P 1.281
6	200.0	201.0	2.917E+05	8.232E+02	P 2.594
7	X 8.000E-01				
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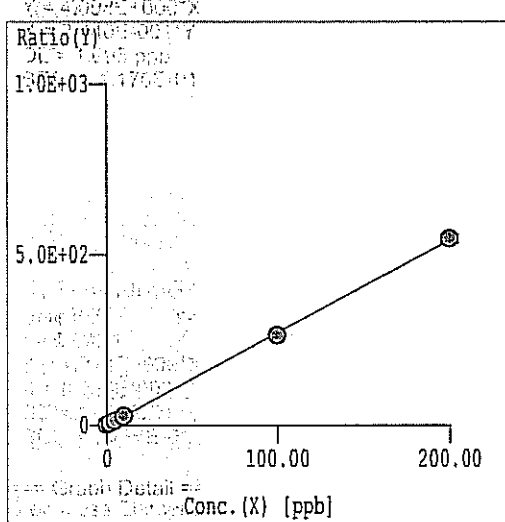
Step Mass Element  
Curve Fit Tl Y=aX+b  
r = 0.9999  
Y = 4.098E+000\*X - 4.794E-001  
X = 2.440E-001\*Y + 1.170E-001  
DL = 1.095 ppb  
BEC = -1.170E-01 ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
5.00 P 62.11  
2.00 P 12.94  
1.00 P 4.423  
0.50 P 2.761  
0.20 P 1.281  
0.10 P 2.594

## === Graph Detail ===

Step Mass Element ISTD Unit  
 (1) 207-Pb 209 ppb



Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	7.421E-01	598.9	1.696E+00	P 57.51
2	2.000	2.464	2286	6.376E+00	P 17.72
3	5.000	5.122	4972	1.360E+01	P 4.317
4	10.00	10.19	1.008E+04	2.738E+01	P 1.718
5	100.0	96.99	9.364E+04	2.633E+02	P 6.389E-01
6	200.0	201.5	1.939E+05	5.472E+02	P 2.335
7	X 8.000E-01				
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19					
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Weight: OFF  
 Min Conc: 0.000

Last Calib: Feb 28, 2008 03:22 am  
 Calibration Type: External Calibration Method  
 Calibration Title: ICP\_OR.S  
 Weighting Method: 1/(SD\*SD)  
 Mass Interpolation Fit for VIS: Point to Point  
 Method: C:\ICPCHEM\1\METHODS\ICP\_OR.S.M  
 Multi Tune: #1 022208a5.u  
 #2 022208h1.u

=== Standard Files ===

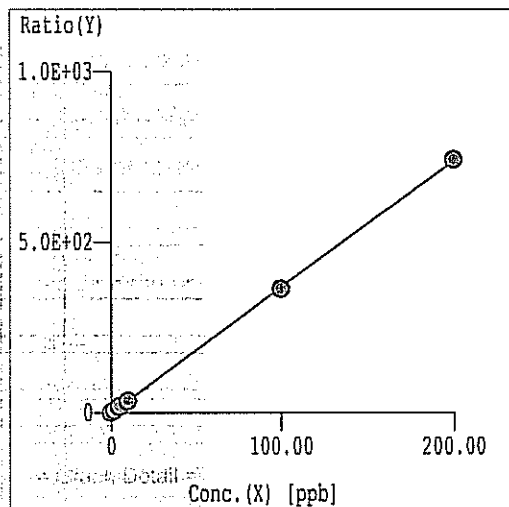
<Data Correction>

Bkg File: —  
 Rejected Masses: —  
 Interference Correction: ON

	Data File	Sample Name	Date Acquired
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2	c:\icpchem\1\data\08b19\00.b\053cals.d\053cals.d#	2/10/200	Feb 19 2008 04:43 pm
3	c:\icpchem\1\data\08b19\00.b\054cals.d\054cals.d#	5/25/500	Feb 19 2008 04:50 pm
4	c:\icpchem\1\data\08b19\00.b\055cals.d\055cals.d#	10/50/1000	Feb 19 2008 04:56 pm
5	c:\icpchem\1\data\08b19\00.b\056cals.d\056cals.d#	100/500/10000	Feb 19 2008 05:02 pm
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7	—		
8	—		
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## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 9 Be                    6      ppb

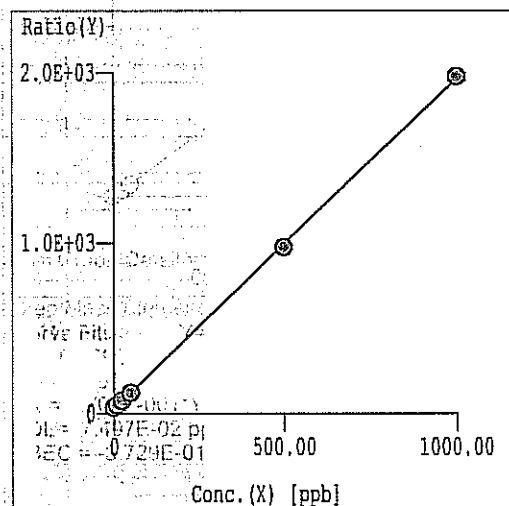


	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	4.576E-01	68.89	3.132E-01	P 29.51
2		2.000	2.341	1529	7.277E+00	P 6.580
3		5.000	5.316	3877	1.828E+01	P 3.467
4		10.00	9.722	7428	3.458E+01	P 2.361
5		100.0	98.32	7.596E+04	3.622E+02	P 1.736
6		200.0	200.8	1.584E+05	7.414E+02	P 4.184E-01
7	X	8.000E-01				
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Step Mass Element  
Curve Fit:  $Y=aX+b$   
 $r = 0.9999$   
 $Y = 3.698E+000 * X - 1.379E+000$   
 $X = 2.704E-001 * Y + 3.729E-001$   
 $DL = 7.497E-02$  ppb  
 $BEC = -3.729E-01$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 11 B                    6      ppb



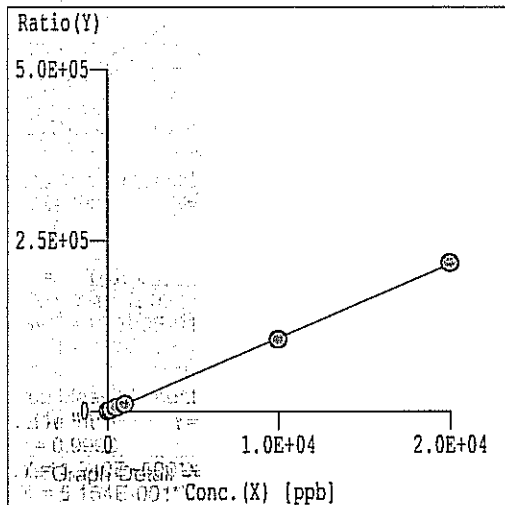
	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	3.464	7345	3.328E+01	P 1.478
2		10.00	12.43	1.064E+04	5.069E+01	P 1.149
3		25.00	25.90	1.629E+04	7.682E+01	P 1.879
4		50.00	49.01	2.612E+04	1.216E+02	P 3.906
5		500.0	488.4	2.043E+05	9.741E+02	P 1.123
6		1000	1006	4.226E+05	1.978E+03	P 1.077
7	X	4.000				
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Step Mass Element  
Curve Fit:  $Y=aX+b$   
 $r = 0.9999$   
 $Y = 1.940E+000 * X + 2.656E+001$   
 $X = 5.154E-001 * Y - 1.369E+001$   
 $DL = 7.607E-01$  ppb  
 $BEC = 13.69$  ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 23 Na                72    ppb

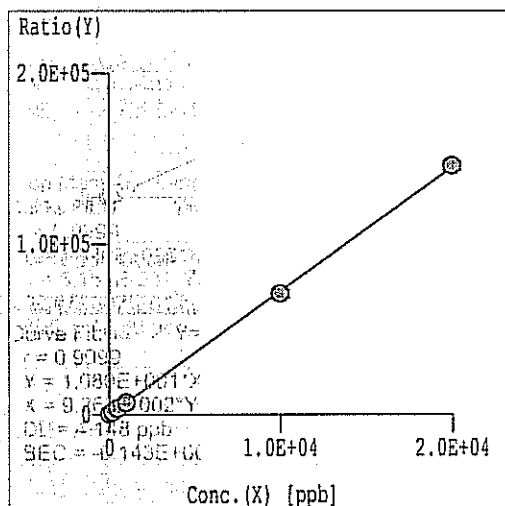


	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	46.59	1.646E+05	4.367E+02	P 3.418
2		200.0	241.1	9.286E+05	2.536E+03	A 6.946E-01
3		500.0	537.5	2.113E+06	5.736E+03	A 8.090E-01
4		1000	987.0	3.956E+06	1.059E+04	A 2.714
5		1.000E+04	9777	3.746E+07	1.055E+05	A 1.752
6		2.000E+04	2.011E+04	7.897E+07	2.170E+05	A 1.537
7	X	80.00				
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19						
20						

Curve Fit:  $Y = aX + b$   
 $r = 0.9999$   
 $Y = 1.080E+001 * X - 6.632E+001$   
 $X = 9.263E-002 * Y + 6.143E+000$   
 $DL = 4.148 \text{ ppb}$   
 $BEC = -6.143E+00 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 24 Mg                72    ppb



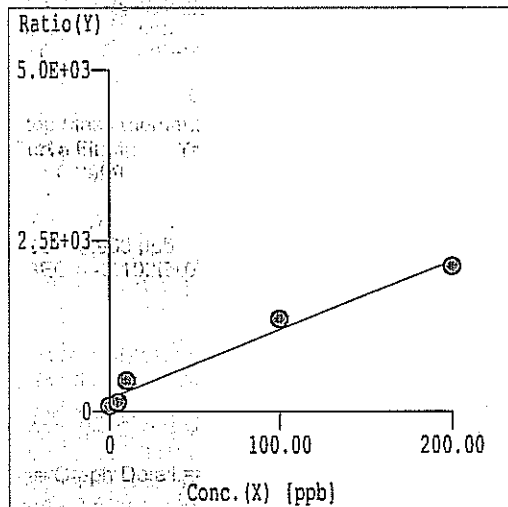
	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	42.63	2.933E+04	7.779E+01	P 21.67
2		200.0	234.6	5.389E+05	1.472E+03	P 7.629E-01
3		500.0	536.5	1.350E+06	3.665E+03	A 8.029E-01
4		1000	994.7	2.614E+06	6.994E+03	A 1.555
5		1.000E+04	9785	2.517E+07	7.085E+04	A 3.321
6		2.000E+04	2.011E+04	5.306E+07	1.458E+05	A 1.722
7	X	80.00				
8						
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19						
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Curve Fit:  $Y = aX + b$   
 $r = 0.9999$   
 $Y = 7.265E+000 * X - 2.319E+002$   
 $X = 1.377E-001 * Y + 3.192E+001$   
 $DL = 6.963 \text{ ppb}$   
 $BEC = -3.192E+01 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 27 Al                72      ppb

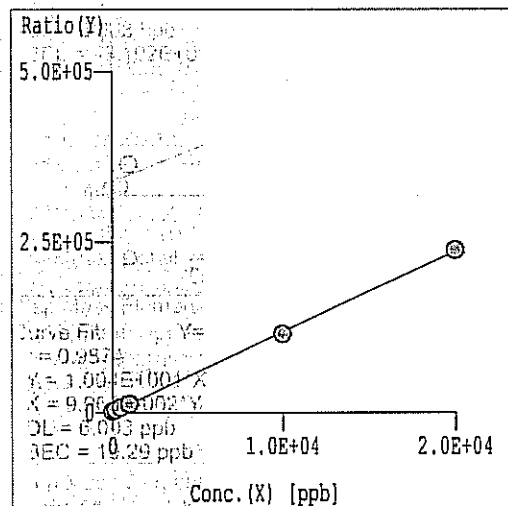


Step Mass Element  
Curve Fit:  $Y = aX + b$   
 $r = 0.9874$   
 $Y = 1.004E+001 * X + 1.937E+002$   
 $X = 9.960E-002 * Y - 1.929E+001$   
DL = 6.003 ppb  
BEC = 19.29 ppb

	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-1.138E+01	2.997E+04	7.943E+01	P 25.30
2	X	2.000		2.898E+04	7.923E+01	P 11.98
3		5.000	-6.077E+00	4.888E+04	1.327E+02	P 5.642
4		10.00	25.45	1.676E+05	4.492E+02	P 10.56
5		100.0	115.0	4.790E+05	1.348E+03	P 3.155
6		200.0	192.0	7.718E+05	2.121E+03	P 1.624
7	X	8.000E-01				
8						
9						
10						
11						
12						
13						
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15						
16						
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18						
19						
20						

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 39 K                72      ppb



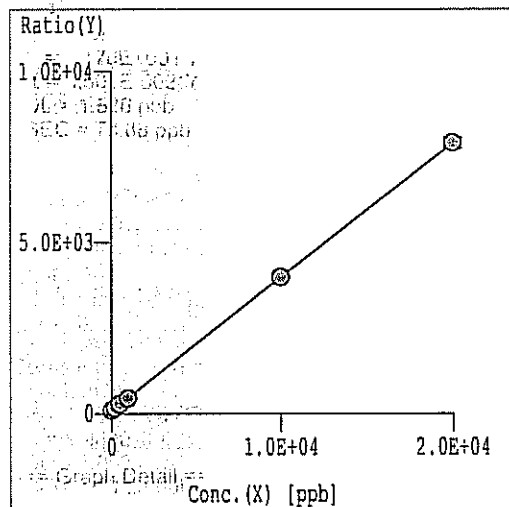
Step Mass Element  
Curve Fit:  $Y = aX + b$   
 $r = 0.9998$   
 $Y = 1.176E+001 * X + 8.686E+002$   
 $X = 8.505E-002 * Y - 7.388E+001$   
DL = 1.526 ppb  
BEC = 73.88 ppb

	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	58.15	5.852E+05	1.552E+03	P 3.853E-01
2		200.0	260.2	1.438E+06	3.928E+03	A 1.420
3		500.0	541.4	2.665E+06	7.235E+03	A 1.061
4		1000	986.9	4.660E+06	1.247E+04	A 2.589
5		1.000E+04	9709	4.085E+07	1.150E+05	A 1.169
6		2.000E+04	2.014E+04	8.649E+07	2.377E+05	A 1.671
7	X	80.00				
8						
9						
10						
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16						
17						
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19						
20						

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 44 Ca                72     ppb

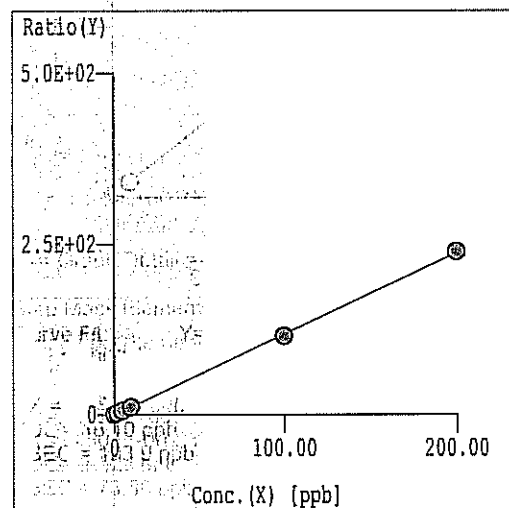


	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	21.04	3.170E+04	8.408E+01	P 2.496
2		200.0	212.7	5.823E+04	1.590E+02	P 2.351
3		500.0	529.6	1.042E+05	2.830E+02	P 6.519E-01
4		1000	944.2	1.663E+05	4.452E+02	P 3.415
5		1.000E+04	9981	1.413E+06	3.980E+03	A 8.709E-01
6		2.000E+04	2.001E+04	2.876E+06	7.903E+03	A 1.989
7	X	80.00				
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19						
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Step Mass Element  
Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 3.911E-001 * X + 7.585E+001$   
 $X = 2.557E+000 * Y - 1.939E+002$   
DL = 16.10 ppb  
BEC = 193.9 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 47 Ti                72     ppb



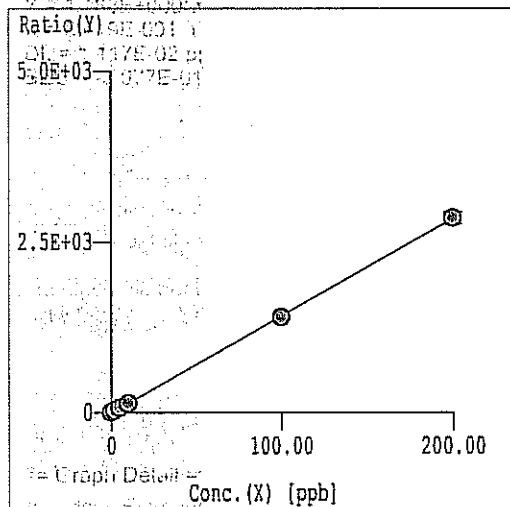
	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	5.416E-01	64.45	1.709E-01	P 2.586
2		2.000	2.601	957.8	2.617E+00	P 3.358
3		5.000	5.367	2175	5.903E+00	P 4.767
4		10.00	9.805	4168	1.117E+01	P 7.997
5		100.0	97.38	4.091E+04	1.152E+02	P 6.981E-01
6		200.0	201.3	8.682E+04	2.386E+02	P 2.168
7	X	8.000E-01				
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Step Mass Element  
Curve Fit:  $Y = aX + b$   
 $r = 0.9999$   
 $Y = 1.188E+000 * X - 4.723E-001$   
 $X = 8.419E-001 * Y + 3.977E-001$   
DL = 1.117E-02 ppb  
BEC = -3.977E-01 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element  
(2) 51 V ISTD Unit  
72 ppb

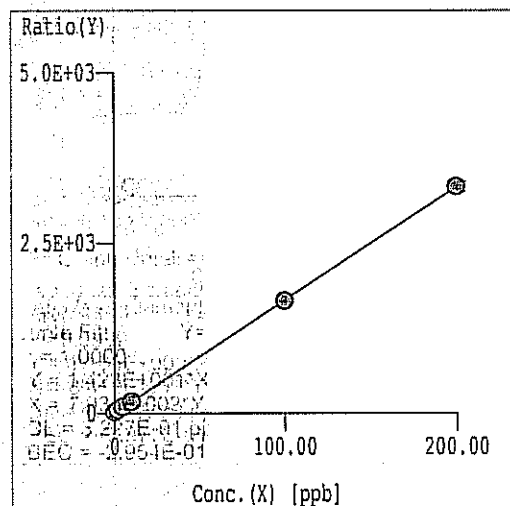


Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	3.656E-01	67.86	9.987E-01	P 153.2
2	2.000	2.357	1917	2.933E+01	P 13.05
3	5.000	5.258	4646	7.059E+01	P 2.052
4	10.00	9.785	9128	1.350E+02	P 2.155
5	100.0	98.47	9.029E+04	1.397E+03	P 2.261
6	200.0	200.8	1.877E+05	2.852E+03	P 3.065
7	X 8.000E-01				
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19					
20					

Curve Fit: V  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 1.423E+001 * X - 4.202E+000$   
 $X = 7.030E-002 * Y + 2.954E-001$   
 $DL = 3.227E-01$  ppb  
 $BEC = -2.954E-01$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element  
(2) 52 Cr ISTD Unit  
72 ppb



Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	3.098E-01	1042	1.547E+01	P 6.557E-01
2	2.000	2.302	3167	4.845E+01	P 4.231
3	5.000	5.139	6282	9.541E+01	P 1.675
4	10.00	9.679	1.153E+04	1.706E+02	P 1.414
5	100.0	99.12	1.068E+05	1.651E+03	P 1.294
6	200.0	200.4	2.190E+05	3.328E+03	P 2.219
7	X 8.000E-01				
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19					
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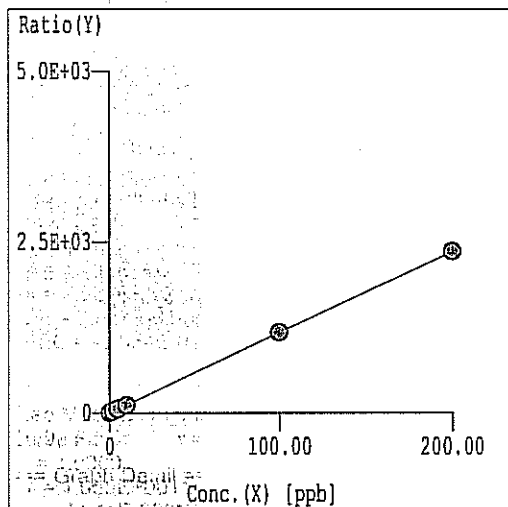
Curve Fit: Cr  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 1.655E+001 * X + 1.034E+001$   
 $X = 6.041E-002 * Y - 6.247E-001$   
 $DL = 1.838E-02$  ppb  
 $BEC = 6.247E-01$  ppb

Weight: OFF  
Min Conc: 0.000



## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 55 Mn                72      ppb

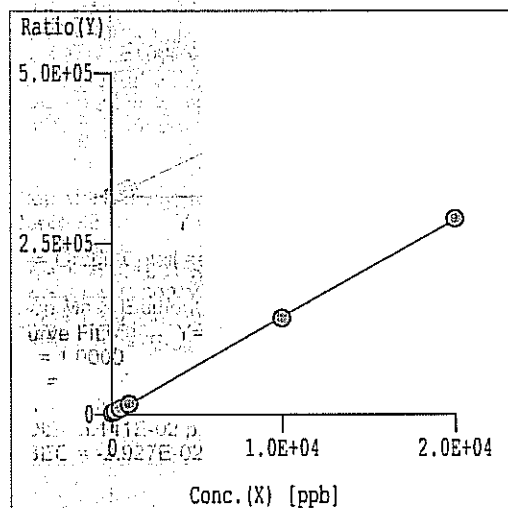


	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	2.027E-01	137.8	2.045E+00	P 11.80
2		2.000	2.160	1642	2.512E+01	P 3.683
3		5.000	5.034	3881	5.900E+01	P 4.080
4		10.00	9.670	7684	1.137E+02	P 1.529
5		100.0	99.84	7.612E+04	1.177E+03	P 4.964E-01
6		200.0	200.1	1.552E+05	2.359E+03	P 1.718
7	X	8.000E-01				
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18						
19						
20						

Curve Fit:  $Y=aX+b$   
 $r=1.0000$   
 $Y = 1.179E+001 * X - 3.450E-001$   
 $X = 8.482E-002 * Y + 2.927E-002$   
 $DL = 6.141E-02$  ppb  
 $BEC = -2.927E-02$  ppb

Weight: OFF  
 Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 56 Fe                72      ppb



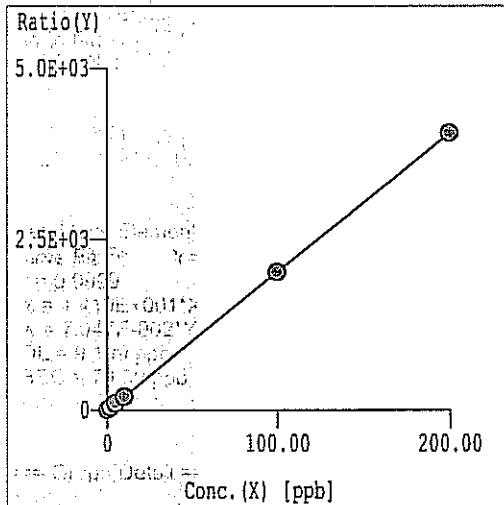
	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	30.88	5.910E+05	1.568E+03	P 2.776
2		200.0	242.2	1.672E+06	4.567E+03	A 2.175
3		500.0	527.1	3.171E+06	8.609E+03	A 6.972E-01
4		1000	995.7	5.701E+06	1.526E+04	A 3.253
5		1.000E+04	9810	4.984E+07	1.403E+05	A 1.598
6		2.000E+04	2.009E+04	1.042E+08	2.863E+05	A 1.000
7	X	80.00				
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18						
19						
20						

Curve Fit:  $Y=aX+b$   
 $r=0.9999$   
 $Y = 1.419E+001 * X + 1.130E+003$   
 $X = 7.047E-002 * Y - 7.959E+001$   
 $DL = 9.199$  ppb  
 $BEC = 79.59$  ppb

Weight: OFF  
 Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 59 Co                72    ppb



	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	1.274E-01	110.0	1.633E+00	P 14.17
2		2.000	2.038	2639	4.036E+01	P 2.535
3		5.000	5.134	6788	1.031E+02	P 1.273
4		10.00	9.770	1.332E+04	1.971E+02	P 2.796
5		100.0	99.85	1.308E+05	2.023E+03	P 1.655
6		200.0	200.1	2.668E+05	4.055E+03	P 9.959E-01
7	X	8.000E-01				
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10						
11						
12						
13						
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18						
19						
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Step Mass Element

Curve Fit:  $Y=aX+b$  $r=1.0000$  $Y=2.027E+001*X-9.495E-001$  $X=4.934E-002*Y+6.685E-002$ 

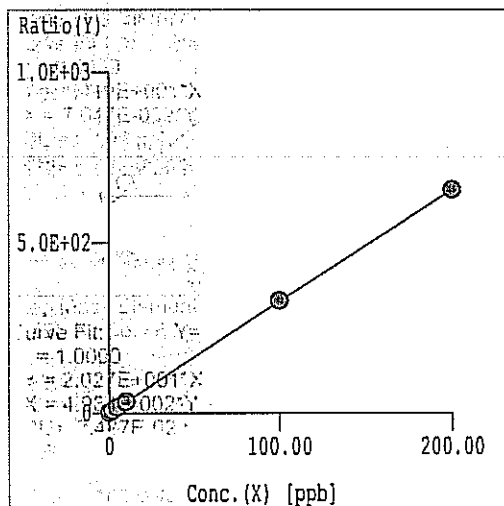
DL=3.427E-02 ppb

BEC=-4.685E-02 ppb

Weight: OFF

Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 60 Ni                72    ppb



	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	2.752E-02	471.1	1.250E+00	P 16.53
2		2.000	1.921	2794	7.631E+00	P 2.045E-01
3		5.000	4.968	6485	1.760E+01	P 1.865
4		10.00	9.910	1.262E+04	3.378E+01	P 3.403
5		100.0	100.4	1.172E+05	3.302E+02	P 5.803E-01
6		200.0	199.8	2.385E+05	6.553E+02	P 1.108
7	X	8.000E-01				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Step Mass Element

Curve Fit:  $Y=aX+b$  $r=1.0000$  $Y=3.274E+000*X+1.340E+000$  $X=3.055E-001*Y-4.095E-001$ 

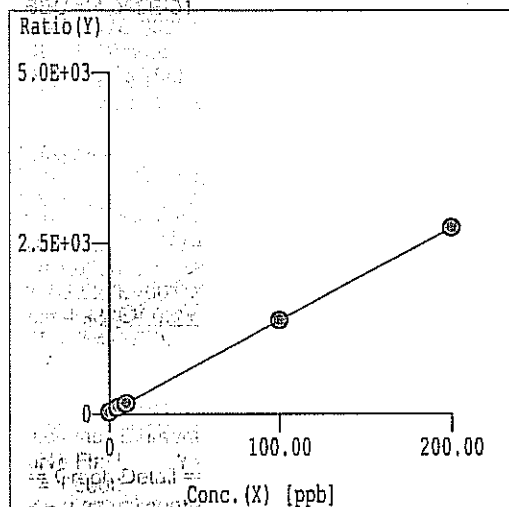
DL=1.894E-01 ppb

BEC=4.095E-01 ppb

Weight: OFF

Min Conc: 0.000

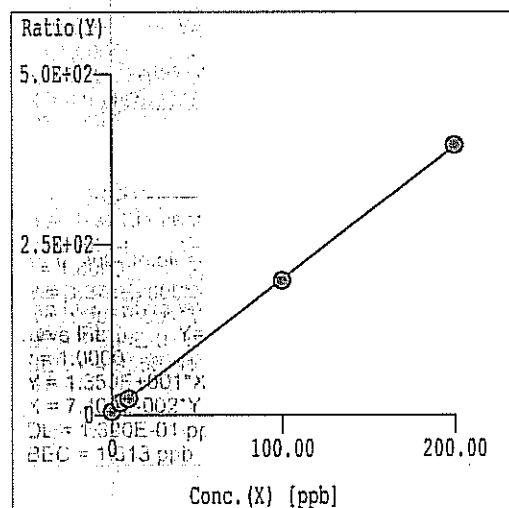
## === Graph Detail ===

Step Mass Element  
(2) 63 CuISTD Unit  
72 ppb

Curve Fit:  $Y=aX+b$   
 $r=1.0000$   
 $Y=1.350E+001 \cdot X + 2.178E+001$   
 $X=7.409E-002 \cdot Y - 1.613E+000$   
 $DL=1.320E-01$  ppb  
 $BEC=1.613$  ppb

Weight: OFF  
 Min Conc: 0.000

R/ct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	9.589E-02	1555	2.307E+01	P 2.574
2	X 2.000	---	3393	5.188E+01	P 2.628
3	5.000	5.348	6184	9.396E+01	P 1.448
4	10.00	9.684	1.031E+04	1.525E+02	P 1.730
5	100.0	99.73	8.847E+04	1.368E+03	P 8.751E-01
6	200.0	200.1	1.792E+05	2.723E+03	P 9.316E-01
7	X 8.000E-01	---	---	---	---
8	---	---	---	---	---
9	---	---	---	---	---
10	---	---	---	---	---
11	---	---	---	---	---
12	---	---	---	---	---
13	---	---	---	---	---
14	---	---	---	---	---
15	---	---	---	---	---
16	---	---	---	---	---
17	---	---	---	---	---
18	---	---	---	---	---
19	---	---	---	---	---
20	---	---	---	---	---

Step Mass Element  
(1) 66 ZnISTD Unit  
72 ppb

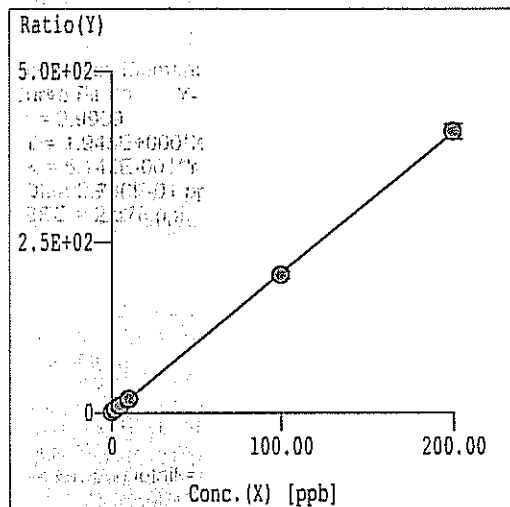
Curve Fit:  $Y=aX+b$   
 $r=0.9999$   
 $Y=1.945E+000 \cdot X + 5.208E+000$   
 $X=5.142E-001 \cdot Y - 2.678E+000$   
 $DL=2.736E-01$  ppb  
 $BEC=2.678$  ppb

Weight: OFF  
 Min Conc: 0.000

R/ct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-2.871E-01	1752	4.649E+00	P 3.814
2	X 2.000	---	3438	9.390E+00	P 1.493
3	5.000	6.409	6508	1.767E+01	P 3.394
4	10.00	9.578	8904	2.383E+01	P 3.106
5	100.0	98.63	6.997E+04	1.970E+02	P 1.604
6	200.0	200.7	1.439E+05	3.955E+02	P 6.389E-01
7	X 8.000E-01	---	---	---	---
8	---	---	---	---	---
9	---	---	---	---	---
10	---	---	---	---	---
11	---	---	---	---	---
12	---	---	---	---	---
13	---	---	---	---	---
14	---	---	---	---	---
15	---	---	---	---	---
16	---	---	---	---	---
17	---	---	---	---	---
18	---	---	---	---	---
19	---	---	---	---	---
20	---	---	---	---	---

## === Graph Detail ===

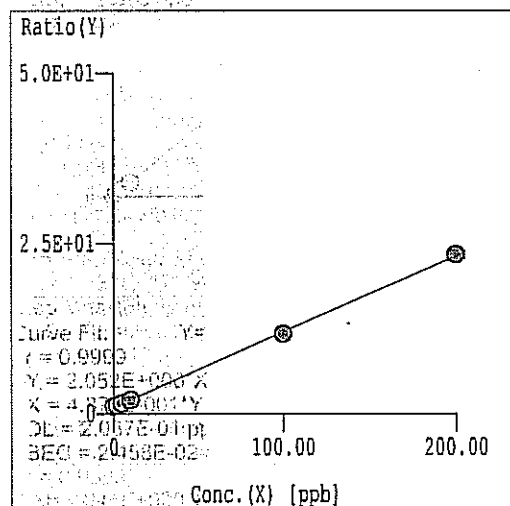
Step Mass Element      ISTD    Unit  
(2) 75 As                72    ppb



Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	4.823E-01	70.00	1.040E+00	P 13.72
2	2.000	2.392	323.3	4.958E+00	P 22.66
3	5.000	5.105	694.5	1.053E+01	P 9.618
4	10.00	9.791	1361	2.014E+01	P 1.255
5	100.0	98.45	1.306E+04	2.021E+02	P 2.536
6	200.0	200.8	2.712E+04	4.120E+02	P 2.726
7	X 8.000E-01				
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19					
20					

Step Mass Element  
(1) 82 Se

ISTD    Unit  
72    ppb



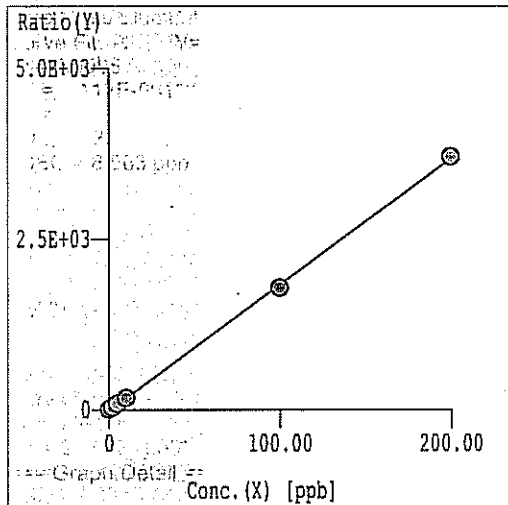
Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	8.532E-01	394.8	1.047E+00	P 4.805
2	2.000	2.755	460.8	1.259E+00	P 5.273
3	5.000	5.176	562.6	1.528E+00	P 4.474
4	10.00	9.752	760.4	2.037E+00	P 5.599
5	100.0	96.93	4166	1.173E+01	P 2.354
6	200.0	201.5	8499	2.336E+01	P 2.168
7	X 8.000E-01				
8					
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10					
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15					
16					
17					
18					
19					
20					

Step Mass Element  
(1) 82 Se

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 88 Sr                72      ppb

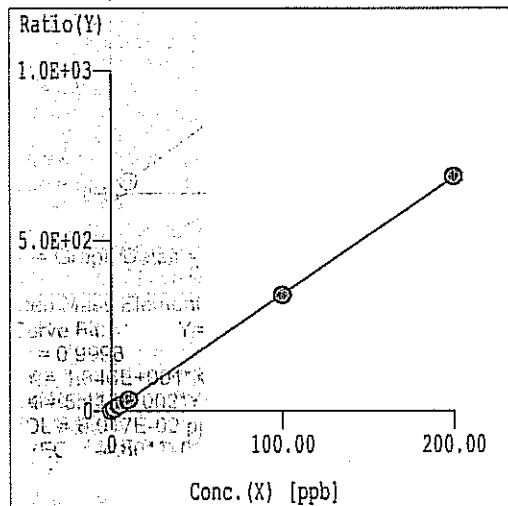


Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	6.185E-01	921.2	2.444E+00	P 20.19
2	2.000	2.471	1.341E+04	3.664E+01	P 2.557
3	5.000	5.376	3.326E+04	9.029E+01	P 9.506E-01
4	10.00	9.932	6.511E+04	1.744E+02	P 5.519
5	100.0	97.23	6.343E+05	1.786E+03	P 7.067E-01
6	200.0	201.4	1.349E+06	3.709E+03	A 1.085
7	X 8.000E-01				
8					
9					
10					
11					
12					
13					
14					
15					
16					
17					
18					
19					
20					

Step Mass Element  
Curve Fit: Sr      Y=aX+b  
r = 0.9998  
Y = 1.846E+001\*X - 8.976E+000  
X = 5.416E-002\*Y + 4.861E-001  
DL = 8.017E-02 ppb  
BEC = -4.861E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 95 Mo                72      ppb



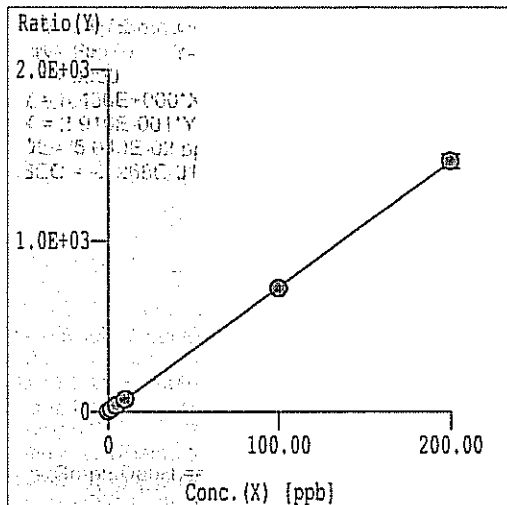
Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	3.504E-01	160.0	4.247E-01	P 13.59
2	2.000	2.232	2521	6.889E+00	P 3.513
3	5.000	5.156	6238	1.694E+01	P 1.324
4	10.00	9.760	1.224E+04	3.276E+01	P 8.708E-01
5	100.0	98.99	1.205E+05	3.393E+02	P 6.928E-01
6	200.0	200.5	2.503E+05	6.882E+02	P 1.519
7	X 8.000E-01				
8					
9					
10					
11					
12					
13					
14					
15					
16					
17					
18					
19					
20					

Step Mass Element  
Curve Fit: Mo      Y=aX+b  
r = 1.0000  
Y = 3.436E+000\*X - 7.794E-001  
X = 2.910E-001\*Y + 2.268E-001  
DL = 5.040E-02 ppb  
BEC = -2.268E-01 ppb

Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 109 Ag              72     ppb

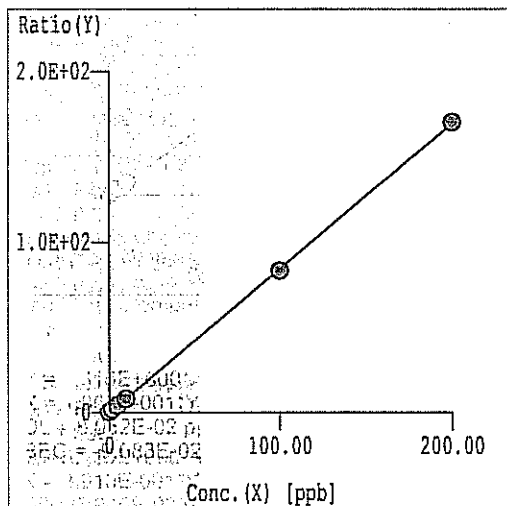


	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	2.041E-01	295.6	7.848E-01	P 25.02
2		2.000	2.155	5510	1.506E+01	P 4.353
3		5.000	5.236	1.385E+04	3.759E+01	P 2.380
4		10.00	9.971	2.697E+04	7.223E+01	P 4.918
5		100.0	98.88	2.566E+05	7.226E+02	P 1.103
6		200.0	200.6	5.334E+05	1.466E+03	P 2.779
7	X	8.000E-01				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 7.315E+000 * X - 7.083E-001$   
 $X = 1.367E-001 * Y + 9.683E-002$   
 $DL = 8.052E-02$  ppb  
 $BEC = -9.683E-02$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 111 Cd              115    ppb



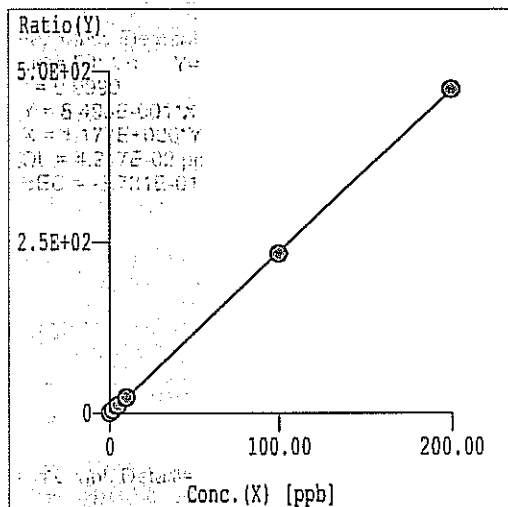
	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	4.585E-01	50.74	7.258E-02	P 16.45
2		2.000	2.357	1139	1.685E+00	P 3.881
3		5.000	5.271	2847	4.159E+00	P 2.167
4		10.00	9.718	5534	7.936E+00	P 2.611
5		100.0	98.39	5.453E+04	8.324E+01	P 3.079E-01
6		200.0	200.8	1.129E+05	1.702E+02	P 3.832E-01
7	X	8.000E-01				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Curve Fit:  $Y = aX + b$   
 $r = 0.9999$   
 $Y = 8.493E-001 * X - 3.168E-001$   
 $X = 1.177E+000 * Y + 3.731E-001$   
 $DL = 4.217E-02$  ppb  
 $BEC = -3.731E-01$  ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 118 Sn            115    ppb

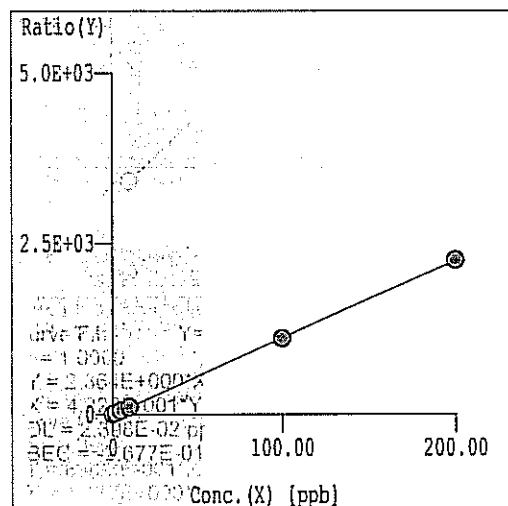


Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	3.834E-01	191.1	2.734E-01	P 6.914
2	2.000	2.269	3198	4.733E+00	P 2.254
3	5.000	5.103	7824	1.143E+01	P 1.137
4	10.00	9.873	1.583E+04	2.271E+01	P 3.705
5	100.0	98.74	1.525E+05	2.328E+02	P 6.690E-01
6	200.0	200.6	3.143E+05	4.737E+02	P 9.545E-01
7	X 8.000E-01				
8					
9					
10					
11					
12					
13					
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15					
16					
17					
18					
19					
20					

Curve Fit:  $Y=aX+b$   
 $r=1.0000$   
 $Y=2.364E+000*X-6.330E-001$   
 $X=4.229E-001*Y$   
 $DL=2.398E-02$  ppb  
 $BEC=2.677E-01$  ppb

Weight: OFF  
 Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 121 Sb            72    ppb



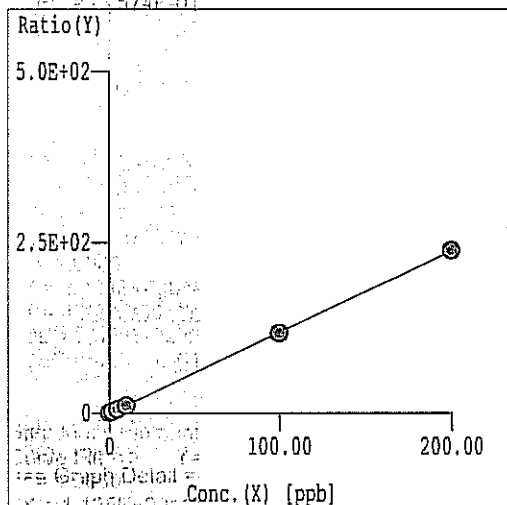
Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	4.590E-01	76.67	1.142E+00	P 28.84
2	2.000	2.322	1445	2.210E+01	P 3.490
3	5.000	5.171	3564	5.414E+01	P 8.361E-01
4	10.00	9.615	7037	1.041E+02	P 1.858
5	100.0	98.84	7.162E+04	1.108E+03	P 2.036
6	200.0	200.6	1.482E+05	2.252E+03	P 4.278E-01
7	X 8.000E-01				
8					
9					
10					
11					
12					
13					
14					
15					
16					
17					
18					
19					
20					

Step Mass Element  
 Curve Fit:  $Y=aX+b$   
 $r=1.0000$   
 $Y=1.125E+001*X-4.020E+000$   
 $X=8.891E-002*Y+3.574E-001$   
 $DL=8.787E-02$  ppb  
 $BEC=3.574E-01$  ppb

Weight: OFF  
 Min Conc: 0.000

## === Graph Detail ===

Step Mass Element  
(1) 137Ba: 0.2 ppb  
Unit  
115 ppb

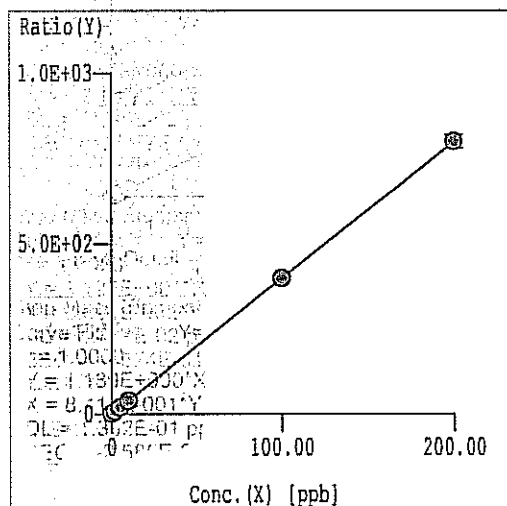


Curve Fit:  $Y=aX+b$   
 $r=1.0000$   
 $Y=1.189E+000X-3.073E-001$   
 $X=8.413E-001Y+2.585E-001$   
 $DL=1.352E-01$  ppb  
 $BEC=-2.585E-01$  ppb

Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	5.271E-01	223.3	3.193E-01	P 16.78
2	2.000	2.402	1721	2.548E+00	P 3.609
3	5.000	5.016	3871	5.655E+00	P 2.619
4	10.00	9.678	7800	1.120E+01	P 6.166
5	100.0	98.73	7.667E+04	1.170E+02	P 7.530E-01
6	200.0	200.6	1.580E+05	2.382E+02	P 9.425E-01
7	X 8.000E-01				
8					
9					
10					
11					
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13					
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15					
16					
17					
18					
19					
20					

Weight: OFF  
Min Conc: 0.000

Step Mass Element  
(1) 203Tl  
Unit  
209 ppb



Curve Fit:  $Y=aX+b$   
 $r=1.0000$   
 $Y=3.999E+000X-3.424E-001$   
 $X=2.500E-001Y+8.562E-002$   
 $DL=1.296E-01$  ppb  
 $BEC=-8.562E-02$  ppb

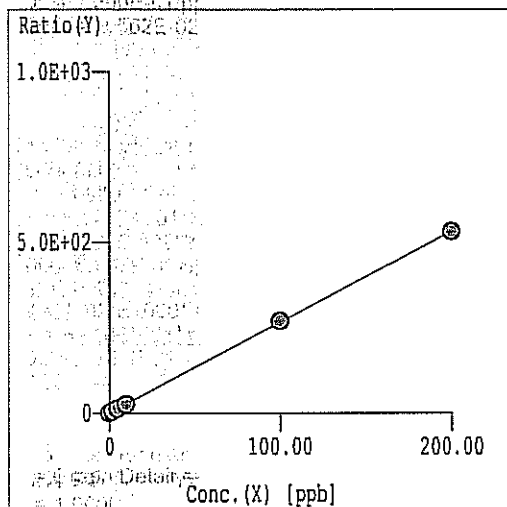
Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	2.705E-01	218.9	7.393E-01	P 23.38
2	2.000	2.052	2257	7.863E+00	P 2.522
3	5.000	4.948	5573	1.944E+01	P 2.327
4	10.00	9.846	1.144E+04	3.903E+01	P 1.305
5	100.0	99.75	1.088E+05	3.986E+02	P 1.434
6	200.0	200.1	2.305E+05	8.001E+02	P 2.517
7	X 8.000E-01				
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10					
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12					
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19					
20					

Weight: OFF  
Min Conc: 0.000



## === Graph Detail ===

Step Mass Element  
(1) 207 Pb 00 Y  
ISTD Unit  
209 ppb



R/ct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	5.641E-02	104.4	3.536E-01	P 18.46
2	2.000	1.982	1571	5.474E+00	P 4.555
3	5.000	4.899	3789	1.323E+01	P 5.665
4	10.00	9.564	7510	2.563E+01	P 1.641
5	100.0	100.9	7.328E+04	2.686E+02	P 1.775
6	200.0	199.6	1.529E+05	5.307E+02	P 4.486E-01
7	X 8.000E-01				
8					
9					
10					
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18					
19					
20					

Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 2.659E+000 * X + 2.036E-001$   
 $X = 3.761E-001 * Y - 7.657E-002$   
 $DL = 7.364E-02$  ppb  
 $BEC = 7.657E-02$  ppb

Weight: OFF  
Min Conc: 0.000

Last Calib: Feb 28, 2008 03:22 am  
 Calibration Type: External Calibration Method  
 Calibration Title: ICP\_OR.S  
 Weighting Method: 1/(SD\*SD)  
 Mass Interpolation Fit for VIS: Point to Point  
 Method: C:\IPCHEM\1\METHODS\ICP\_OR.S.M  
 Multitune: #1 022208a5.u  
 #2 022208h1.u

=== Standard Files ===

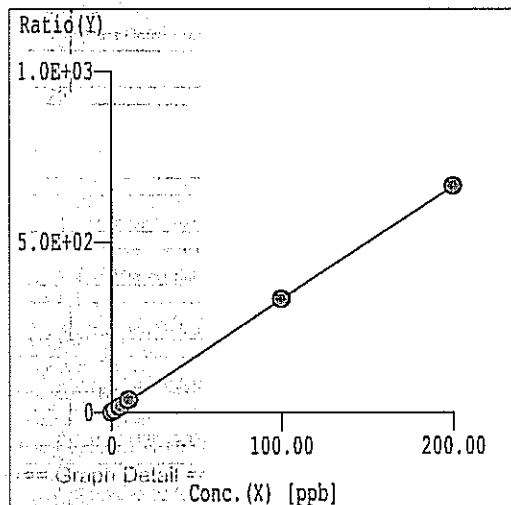
<Data Correction>

Bkg File: —  
 Rejected Masses: —  
 Interference Correction: ON

	Data File	Sample Name	Date Acquired
1	c:\ipchem\1\data\08b20m00.b\004calb.d\004calb.d#	CAL BLK	Feb 20 2008 12:46 pm
2	c:\ipchem\1\data\08b20m00.b\005cals.d\005cals.d#	2/10/200	Feb 20 2008 12:52 pm
3	c:\ipchem\1\data\08b20m00.b\012cals.d\012cals.d#	5/25/500	Feb 20 2008 01:36 pm
4	c:\ipchem\1\data\08b20m00.b\007cals.d\007cals.d#	10/50/1000	Feb 20 2008 01:05 pm
5	c:\ipchem\1\data\08b20m00.b\013cals.d\013cals.d#	100/500/10000	Feb 20 2008 01:43 pm
6	c:\ipchem\1\data\08b20m00.b\015cals.d\015cals.d#	200/1000/20000	Feb 20 2008 01:55 pm
7	—		
8	—		
9	—		
10	—		
11	—		
12	—		Feb 20 2008 12:46 pm
13	—		Feb 20 2008 12:46 pm
14	—		Feb 20 2008 01:36 pm
15	—		Feb 20 2008 01:05 pm
16	—		Feb 20 2008 01:43 pm
17	—		Feb 20 2008 01:55 pm
18	—		
19	—		
20	—		

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 9 Be                    6       ppb

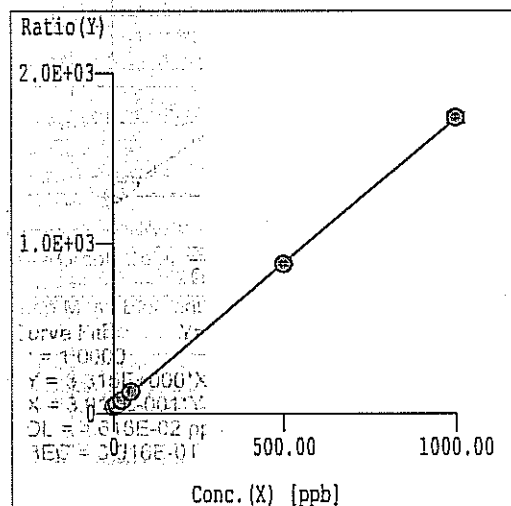


	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-3.540E-01	27.78	1.246E-01	P 40.92
2		2.000	1.773	1602	7.173E+00	P 3.560
3		5.000	4.811	3929	1.725E+01	P 3.043
4		10.00	10.88	8109	3.737E+01	P 5.649
5		100.0	99.85	7.694E+04	3.323E+02	P 2.870
6		200.0	200.0	1.566E+05	6.644E+02	P 1.195E-01
7	X	8.000E-01				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Step Mass Element  
Curve Fit:  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 3.315E+000 \cdot X + 1.298E+000$   
 $X = 3.017E-001 \cdot Y - 3.916E-001$   
DL = 4.616E-02 ppb  
BEC = 3.916E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 11 B                    6       ppb



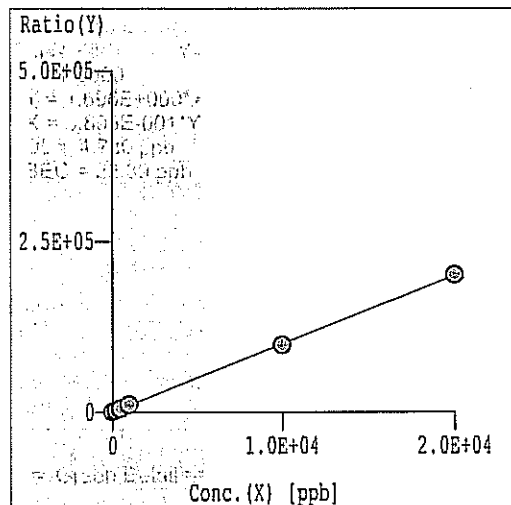
	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	1.394	8930	4.035E+01	P 6.698
2		10.00	9.217	1.198E+04	5.363E+01	P 9.216E-01
3		25.00	23.72	1.783E+04	7.822E+01	P 2.638
4		50.00	53.48	2.793E+04	1.287E+02	P 5.289
5		500.0	494.6	2.032E+05	8.771E+02	P 5.759E-01
6		1000	1003	4.097E+05	1.739E+03	P 1.808
7	X	4.000				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Step Mass Element  
Curve Fit:  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 1.696E+000 \cdot X + 3.799E+001$   
 $X = 5.895E-001 \cdot Y - 2.239E+001$   
DL = 4.780 ppb  
BEC = 22.39 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

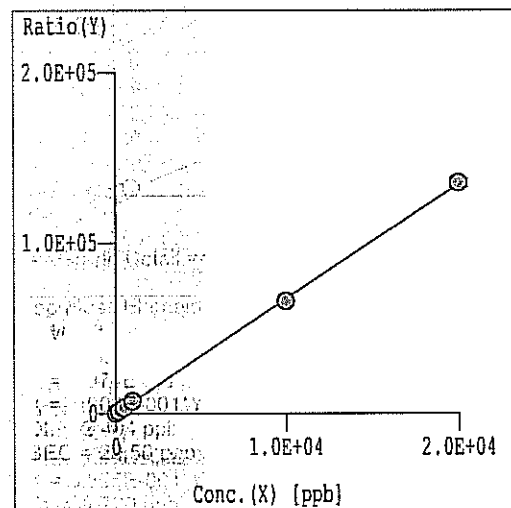
Step Mass Element      ISTD    Unit  
(1) 23 Na                72    ppb



	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	8.221	1.346E+05	3.763E+02	P 2.124
2		200.0	201.7	8.211E+05	2.306E+03	M 8.085E-01
3		500.0	509.1	1.913E+06	5.372E+03	A 2.144
4		1000	1082	3.710E+06	1.109E+04	A 5.946
5		1.000E+04	9807	3.479E+07	9.811E+04	A 1.225
6		2.000E+04	2.009E+04	7.144E+07	2.007E+05	A 2.204
7	X	80.00				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 24 Mg                72    ppb



	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	7.140	1.285E+04	3.597E+01	P 6.490
2		200.0	203.5	4.826E+05	1.355E+03	P 1.117
3		500.0	516.3	1.231E+06	3.457E+03	A 3.676
4		1000	1087	2.442E+06	7.294E+03	A 5.621
5		1.000E+04	9781	2.330E+07	6.572E+04	A 7.191E-01
6		2.000E+04	2.010E+04	4.809E+07	1.351E+05	A 1.771
7	X	80.00				
8						
9						
10						
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Y = 9.338E+000X + 5.670E+001

Step Mass Element

ISTD

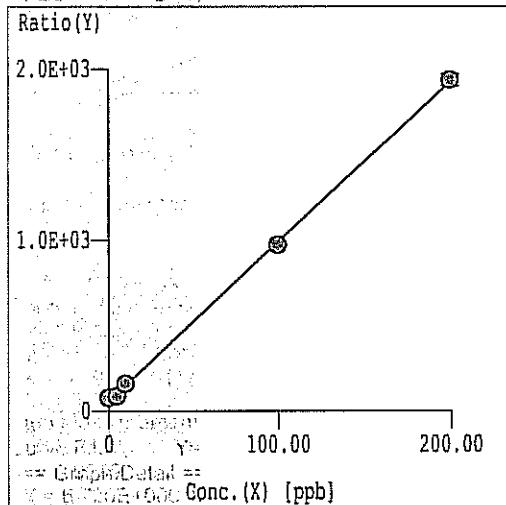
Unit

(1) 27 Al

72

ppb

REC = 1.757E+001



Step Mass Element

Curve Fit: Y=aX+b

r = 0.9998

Y = 9.338E+000X + 5.670E+001

X = 1.071E-001Y - 6.072E+000

DL = 1.129 ppb

BEC = 6.072 ppb

Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	2.025	2.703E+04	7.561E+01	P 4.647
2	X 2.000	---	3.057E+04	8.586E+01	P 3.290
3	5.000	3.098	3.050E+04	8.563E+01	P 2.613
4	10.00	10.94	5.318E+04	1.589E+02	P 6.389
5	100.0	97.87	3.442E+05	9.706E+02	P 4.894E-01
6	200.0	201.1	6.886E+05	1.934E+03	P 1.793
7	X 8.000E-01	---	---	---	---
8	---	---	---	---	---
9	---	---	---	---	---
10	---	---	---	---	---
11	---	---	---	---	---
12	---	---	---	---	---
13	---	---	---	---	---
14	---	---	---	---	---
15	---	---	---	---	---
16	---	---	---	---	---
17	---	---	---	---	---
18	---	---	---	---	---
19	---	---	---	---	---
20	---	---	---	---	---

Weight: OFF

Min Conc: 0.000

Step Mass Element

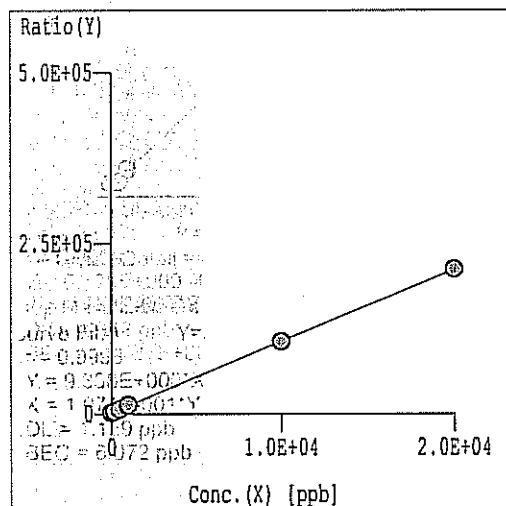
ISTD

Unit

(1) 39 K

72

ppb



Step Mass Element

Curve Fit: Y=aX+b

r = 1.0000

Y = 1.050E+001X + 1.908E+003

X = 9.524E-002Y - 1.817E+002

DL = 24.34 ppb

BEC = 181.7 ppb

Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-1.650E+01	6.200E+05	1.734E+03	P 4.912
2	200.0	191.6	1.396E+06	3.920E+03	A 2.348
3	500.0	480.6	2.476E+06	6.954E+03	A 2.223
4	1000	1087	4.458E+06	1.332E+04	A 5.635
5	1.000E+04	9923	3.761E+07	1.061E+05	A 2.398
6	2.000E+04	2.003E+04	7.556E+07	2.123E+05	A 2.050
7	X 80.00	---	---	---	---
8	---	---	---	---	---
9	---	---	---	---	---
10	---	---	---	---	---
11	---	---	---	---	---
12	---	---	---	---	---
13	---	---	---	---	---
14	---	---	---	---	---
15	---	---	---	---	---
16	---	---	---	---	---
17	---	---	---	---	---
18	---	---	---	---	---
19	---	---	---	---	---
20	---	---	---	---	---

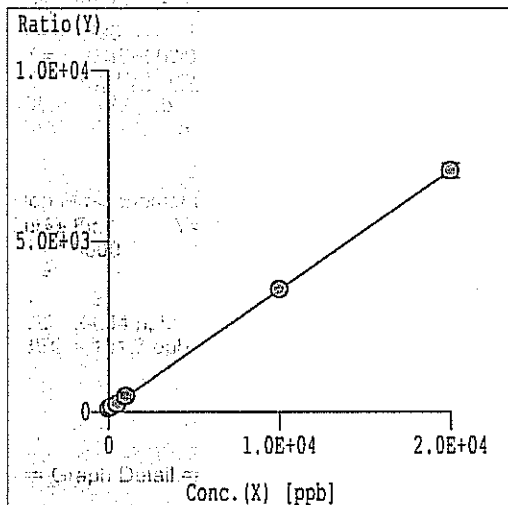
Weight: OFF

Min Conc: 0.000

=== Graph Detail ===

Step Mass Element  
(1) 44 Ca

ISTD 72 Unit  
ppb



R/ct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	22.46	3.524E+04	9.855E+01	P 4.717
2	200.0	193.7	5.639E+04	1.584E+02	P 9.248E-01
3	500.0	414.7	8.388E+04	2.356E+02	P 2.861
4	1000	1056	1.539E+05	4.596E+02	P 5.006
5	1.000E+04	1.003E+04	1.274E+06	3.593E+03	A 1.127
6	2.000E+04	1.999E+04	2.517E+06	7.071E+03	A 3.001
7	X 80.00				
8					
9					
10					
11					
12					
13					
14					
15					
16					
17					
18					
19					
20					

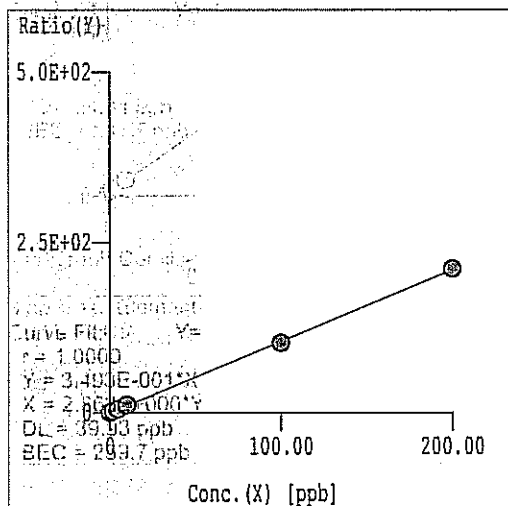
Rep Mass Element  
Curve Fit: Y=aX+b  
r = 1.0000  
Y = 3.493E-001\*X + 9.070E+001  
X = 2.863E+000\*Y - 2.597E+002  
DL = 39.93 ppb  
BEC = 259.7 ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
E-01 P 4.717  
E-02 P 9.248E-01  
E-02 P 2.861  
E-02 P 5.006  
E-03 A 1.127  
E-03 A 3.001

Step Mass Element  
(1) 47 Ti

ISTD 72 Unit  
ppb



R/ct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	2.306E-01	63.34	1.768E-01	P 8.360
2	2.000	2.230	810.0	2.275E+00	P 5.472
3	5.000	5.079	1875	5.263E+00	P 6.410
4	10.00	10.71	3738	1.117E+01	P 7.020
5	100.0	97.58	3.628E+04	1.023E+02	P 7.023E-01
6	200.0	201.2	7.511E+04	2.110E+02	P 1.811
7	X 8.000E-01				
8					
9					
10					
11					
12					
13					
14					
15					
16					
17					
18					
19					
20					

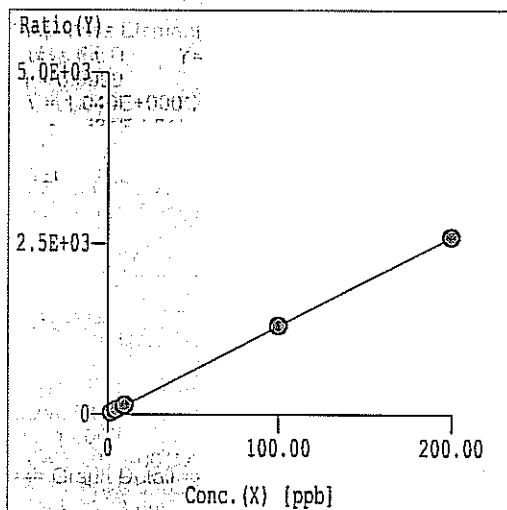
Rep Mass Element  
Curve Fit: Y=aX+b  
r = 0.9999  
Y = 1.049E+000\*X - 6.521E-002  
X = 9.531E-001\*Y + 6.215E-002  
DL = 4.225E-02 ppb  
BEC = 6.215E-02 ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
E-00 P 8.360  
E+00 P 5.472  
E+01 P 6.410  
E+02 P 7.020  
E+02 P 7.023E-01  
E+02 P 1.811

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 51 V                72    ppb

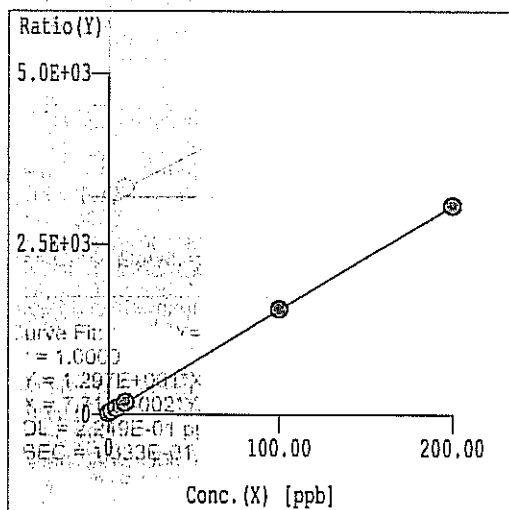


Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-2.406E-01	-8.790E+01	-1.391E+00	P -6.990E+01
2	2.000	1.855	1570	2.579E+01	P 20.73
3	5.000	5.012	4351	6.673E+01	P 2.431
4	10.00	10.36	8297	1.362E+02	P 1.470
5	100.0	100.1	8.528E+04	1.299E+03	P 1.549
6	200.0	200.0	1.733E+05	2.595E+03	P 1.014
7	X 8.000E-01				
8					
9					
10					
11					
12					
13					
14					
15					
16					
17					
18					
19					
20					

Curve Fit:  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 1.297E+001 \cdot X + 1.729E+000$   
 $X = 7.710E-002 \cdot Y - 1.333E-001$   
DL = 2.249E-01 ppb  
BEC = 1.333E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 52 Cr                72    ppb



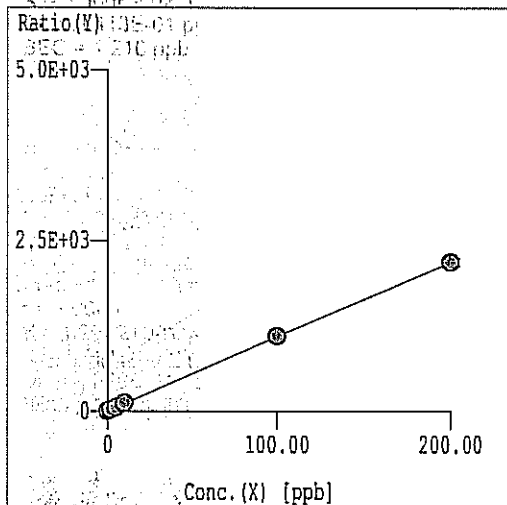
Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-2.902E-01	878.9	1.409E+01	P 12.29
2	2.000	1.818	2830	4.621E+01	P 5.182
3	5.000	4.814	5988	9.183E+01	P 1.801
4	10.00	10.55	1.092E+04	1.791E+02	P 6.959E-01
5	100.0	100.3	1.014E+05	1.545E+03	P 1.532
6	200.0	199.8	2.045E+05	3.062E+03	P 1.498
7	X 8.000E-01				
8					
9					
10					
11					
12					
13					
14					
15					
16					
17					
18					
19					
20					

Curve Fit:  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 1.523E+001 \cdot X + 1.851E+001$   
 $X = 6.566E-002 \cdot Y - 1.216E+000$   
DL = 3.413E-01 ppb  
BEC = 1.216 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 55 Mn                72    ppb

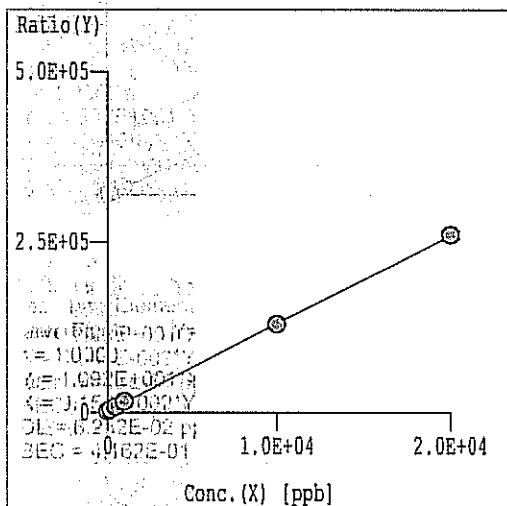


Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 1.092E+001 * X + 4.544E+000$   
 $X = 9.158E-002 * Y - 4.162E-001$   
 $DL = 8.252E-02$  ppb  
 $BEC = 4.162E-01$  ppb

	RJct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-2.464E-01	115.6	1.854E+00	P 16.20
2		2.000	1.876	1535	2.503E+01	P 5.606
3		5.000	4.673	3626	5.557E+01	P 3.073
4		10.00	10.53	7286	1.195E+02	P 1.813
5		100.0	100.4	7.226E+04	1.100E+03	P 1.154
6		200.0	199.8	1.460E+05	2.186E+03	P 2.576
7	X	8.000E-01				
8						
9						
10						
11						
12						
13						
14						
15						
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19						
20						

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 56 Fe                72    ppb



Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 1.289E+001 * X + 1.844E+003$   
 $X = 7.760E-002 * Y - 1.431E+002$   
 $DL = 13.02$  ppb  
 $BEC = 143.1$  ppb

	RJct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-2.631E+01	5.383E+05	1.505E+03	P 3.716
2		200.0	199.3	1.571E+06	4.412E+03	A 2.172
3		500.0	493.4	2.921E+06	8.203E+03	A 2.661
4		1000	1095	5.341E+06	1.595E+04	A 6.159
5		1.000E+04	9886	4.584E+07	1.293E+05	A 1.180
6		2.000E+04	2.005E+04	9.265E+07	2.603E+05	A 2.150
7	X	80.00				
8						
9						
10						
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12						
13						
14						
15						
16						
17						
18						
19						
20						

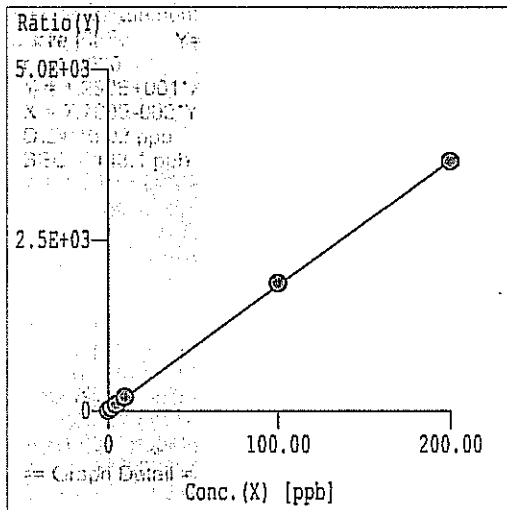
Weight: OFF  
Min Conc: 0.000



=== Graph Detail ===

Step Mass Element  
(2) 59 Co

ISTD  
72  
Unit  
ppb



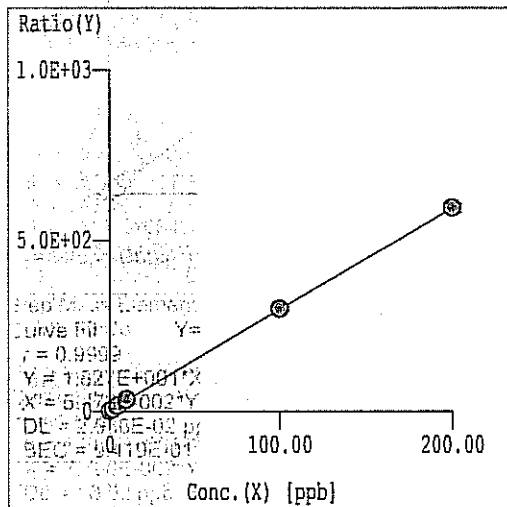
Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-4.795E-01	71.11	1.140E+00	P 15.86
2	2.000	1.649	2447	4.003E+01	P 10.36
3	5.000	4.645	6185	9.479E+01	P 2.647
4	10.00	10.46	1.226E+04	2.011E+02	P 1.276
5	100.0	101.5	1.224E+05	1.864E+03	P 9.638E-01
6	200.0	199.3	2.438E+05	3.651E+03	P 1.434
7	X 8.000E-01				
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9					
10					
11					
12					
13					
14					
15					
16					
17					
18					
19					
20					

Step Mass Element  
Curve Fit: Co Y=aX+b  
r = 0.9999  
Y = 1.827E+001\*X + 9.902E+000  
X = 5.472E-002\*Y - 5.419E-001  
DL = 2.968E-02 ppb  
BEC = 5.419E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element  
(1) 60 Ni

ISTD  
72  
Unit  
ppb



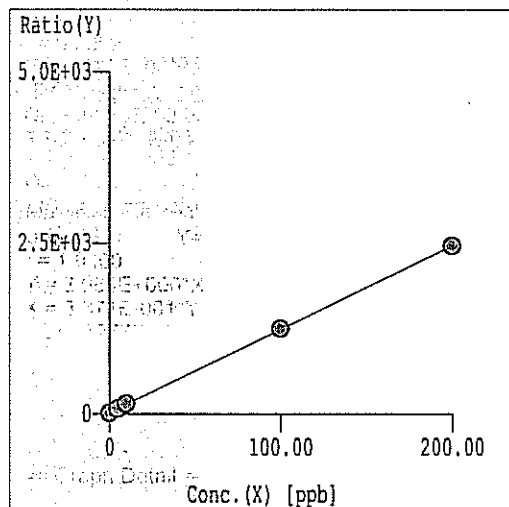
Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-4.286E-01	272.2	7.618E-01	P 8.146
2	2.000	1.527	2337	6.563E+00	P 3.349
3	5.000	4.945	5947	1.670E+01	P 4.552
4	10.00	10.91	1.152E+04	3.441E+01	P 6.202
5	100.0	100.2	1.061E+05	2.991E+02	P 1.705
6	200.0	199.9	2.118E+05	5.949E+02	P 2.185
7	X 8.000E-01				
8					
9					
10					
11					
12					
13					
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16					
17					
18					
19					
20					

Step Mass Element  
Curve Fit: Ni Y=aX+b  
r = 1.0000  
Y = 2.966E+000\*X + 2.033E+000  
X = 3.371E-001\*Y - 6.855E-001  
DL = 6.277E-02 ppb  
BEC = 6.855E-01 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 63 Cu                72    ppb

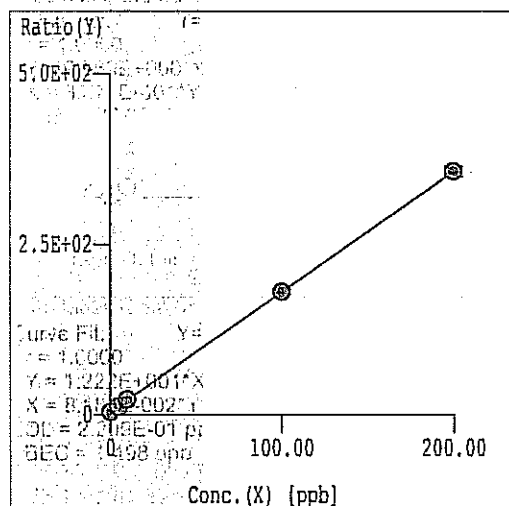


	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-7.091E-01	601.1	9.635E+00	P 9.337
2	X	2.000	---	2362	3.855E+01	P 3.592
3		5.000	4.668	4915	7.533E+01	P 3.112
4		10.00	10.70	9081	1.490E+02	P 8.642E-01
5		100.0	100.7	8.201E+04	1.249E+03	P 3.662E-01
6		200.0	199.6	1.641E+05	2.457E+03	P 7.254E-01
7	X	8.000E-01	---	---	---	---
8		---	---	---	---	---
9		---	---	---	---	---
10		---	---	---	---	---
11		---	---	---	---	---
12		---	---	---	---	---
13		---	---	---	---	---
14		---	---	---	---	---
15		---	---	---	---	---
16		---	---	---	---	---
17		---	---	---	---	---
18		---	---	---	---	---
19		---	---	---	---	---
20		---	---	---	---	---

Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 1.222E+001 * X + 1.830E+001$   
 $X = 8.185E-002 * Y - 1.498E+000$   
 $DL = 2.209E-01$  ppb  
 $BEC = 1.498$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 66 Zn                72    ppb



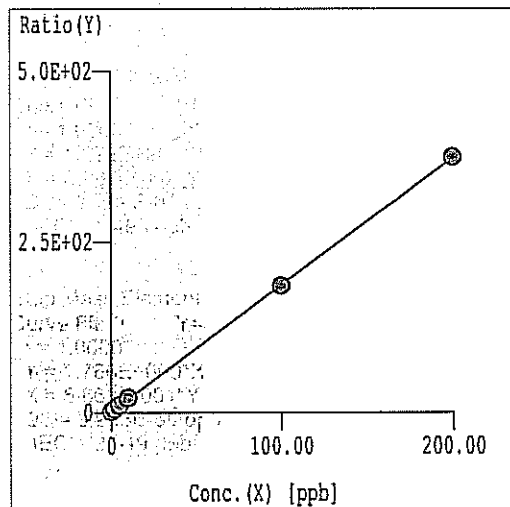
	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-9.442E-02	1216	3.400E+00	P 6.902
2	X	2.000	---	2129	5.980E+00	P 4.110
3		5.000	4.539	4125	1.158E+01	P 3.493
4		10.00	10.55	7434	2.221E+01	P 5.781
5		100.0	100.0	6.391E+04	1.803E+02	P 2.053
6		200.0	200.0	1.270E+05	3.568E+02	P 2.157
7	X	8.000E-01	---	---	---	---
8		---	---	---	---	---
9		---	---	---	---	---
10		---	---	---	---	---
11		---	---	---	---	---
12		---	---	---	---	---
13		---	---	---	---	---
14		---	---	---	---	---
15		---	---	---	---	---
16		---	---	---	---	---
17		---	---	---	---	---
18		---	---	---	---	---
19		---	---	---	---	---
20		---	---	---	---	---

Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 1.766E+000 * X + 3.567E+000$   
 $X = 5.662E-001 * Y - 2.019E+000$   
 $DL = 3.986E-01$  ppb  
 $BEC = 2.019$  ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 75 As                72     ppb



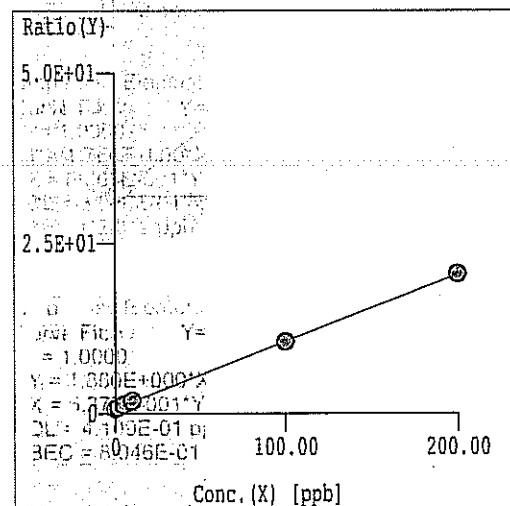
	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-1.838E-01	72.22	1.155E+00	P 22.06
2		2.000	1.982	317.8	5.183E+00	P 3.923
3		5.000	5.030	707.8	1.085E+01	P 3.808E-01
4		10.00	10.68	1300	2.136E+01	P 6.905
5		100.0	99.06	1.219E+04	1.857E+02	P 2.340
6		200.0	200.4	2.499E+04	3.743E+02	P 1.141
7	X	8.000E-01				
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Step Mass Element  
Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 1.860E+000 \cdot X + 1.496E+000$   
 $X = 5.377E-001 \cdot Y - 8.046E-001$   
 $DL = 4.109E-01$  ppb  
 $BEC = 8.046E-01$  ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
 E+00 P 22.06  
 E+00 P 3.923  
 E+01 P 3.808E-01  
 E+01 P 6.905  
 E+02 P 2.340  
 E+02 P 1.141

Step Mass Element      ISTD    Unit  
(1) 82 Se                72     ppb



	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-8.941E-01	240.7	6.743E-01	P 11.26
2		2.000	1.352	318.9	8.955E-01	P 3.995
3		5.000	5.668	470.4	1.321E+00	P 2.704
4		10.00	11.42	631.9	1.887E+00	P 5.321
5		100.0	99.06	3730	1.052E+01	P 4.136E-01
6		200.0	200.4	7296	2.049E+01	P 5.488E-01
7	X	8.000E-01				
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20						

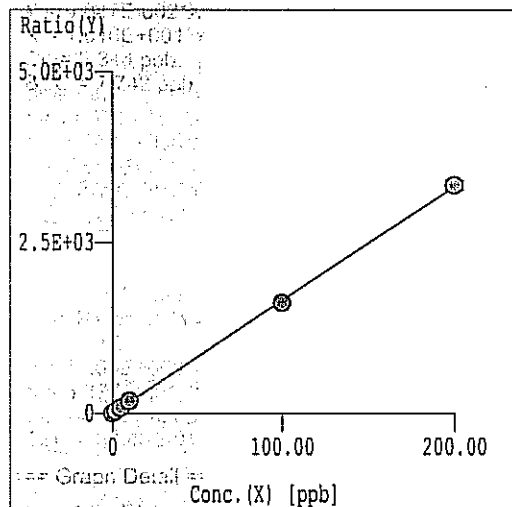
Step Mass Element  
Curve Fit:  $Y = aX + b$   
 $r = 0.9999$   
 $Y = 9.847E-002 \cdot X + 7.624E-001$   
 $X = 1.016E+001 \cdot Y - 7.742E+000$   
 $DL = 2.314$  ppb  
 $BEC = 7.742$  ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
 E-01 P 11.26  
 E-01 P 3.995  
 E+00 P 2.704  
 E+00 P 5.321  
 E+01 P 4.136E-01  
 E+01 P 5.488E-01

## === Graph Detail ===

Step Mass Element  
(1) 88.Sr ISTD Unit  
72 ppb

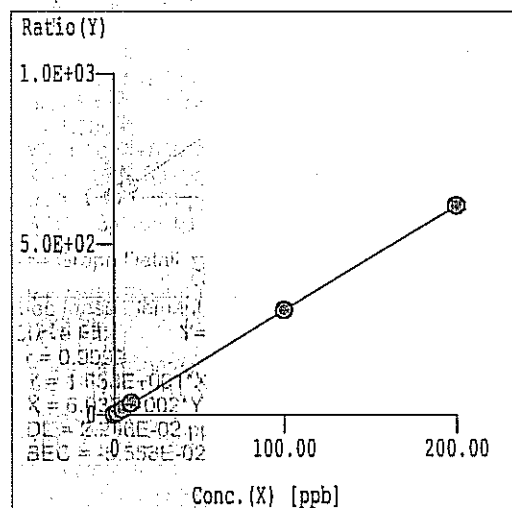


Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	1.923E-01	810.0	2.266E+00	P 5.600
2	2.000	2.131	1.225E+04	3.441E+01	P 3.933
3	5.000	5.014	2.927E+04	8.220E+01	P 2.527
4	10.00	11.00	6.074E+04	1.815E+02	P 5.918
5	100.0	97.43	5.724E+05	1.614E+03	P 1.456
6	200.0	201.2	1.187E+06	3.335E+03	A 2.013
7	X 8.000E-01				
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19					
20					

Step Mass Element  
Curve Fit: Y=aX+b  
r = 0.9999  
Y = 1.658E+001\*X - 9.215E-001  
X = 6.032E-002\*Y + 5.558E-002  
DL = 2.296E-02 ppb  
BEC = 5.558E-02 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element  
(1) 95.Mo ISTD Unit  
72 ppb



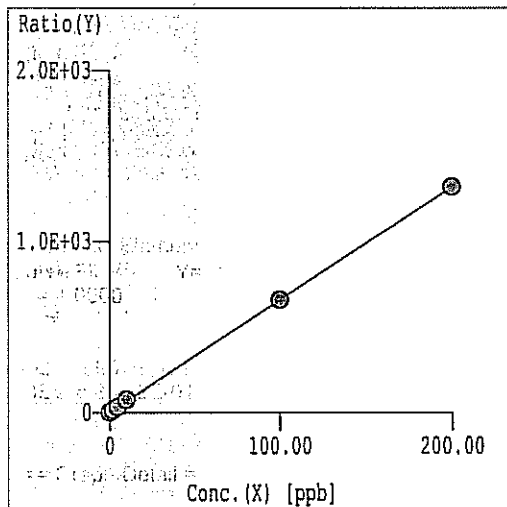
Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	3.027E-01	47.78	1.330E-01	P 22.49
2	2.000	1.679	2205	6.191E+00	P 1.308
3	5.000	4.801	5601	1.574E+01	P 5.861
4	10.00	10.98	1.159E+04	3.461E+01	P 5.917
5	100.0	99.78	1.085E+05	3.061E+02	P 8.815E-01
6	200.0	200.1	2.181E+05	6.127E+02	P 1.687
7	X 8.000E-01				
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20					

Step Mass Element  
Curve Fit: Mo Y=aX+b  
r = 1.0000  
Y = 3.057E+000\*X + 1.058E+000  
X = 3.271E-001\*Y - 3.462E-001  
DL = 2.936E-02 ppb  
BEC = 3.462E-01 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 109 Ag                72     ppb

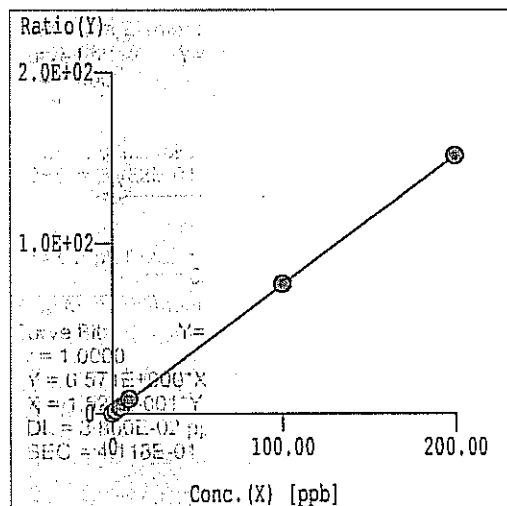


	Rtct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-3.527E-01	140.0	3.888E-01	P 21.75
2		2.000	1.738	5031	1.413E+01	P 2.948
3		5.000	4.756	1.210E+04	3.396E+01	P 1.076
4		10.00	11.04	2.521E+04	7.526E+01	P 4.100
5		100.0	99.72	2.333E+05	6.580E+02	P 1.394
6		200.0	200.1	4.691E+05	1.318E+03	P 5.650E-01
7	X	8.000E-01				
8						
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13						
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17						
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20						

Curve Fit:  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 6.571E+000 \cdot X + 2.706E+000$   
 $X = 1.522E-001 \cdot Y - 4.118E-001$   
 $DL = 3.860E-02$  ppb  
 $BEC = 4.118E-01$  ppb

Weight: OFF  
 Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 111 Cd                115     ppb



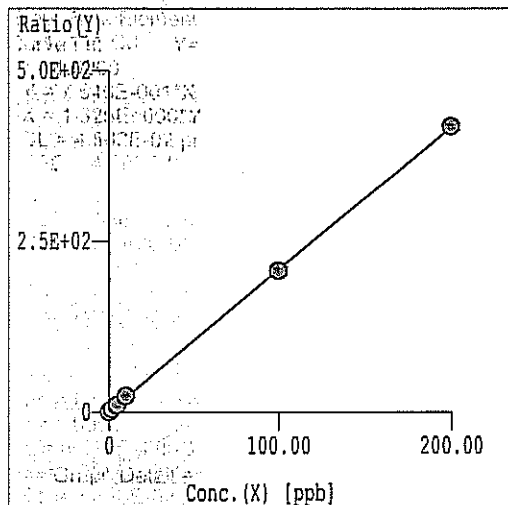
	Rtct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-4.339E-01	12.59	1.991E-02	P 57.88
2		2.000	1.700	1024	1.630E+00	P 3.137
3		5.000	4.637	2517	3.846E+00	P 3.948
4		10.00	10.99	5196	8.638E+00	P 7.544
5		100.0	100.3	4.920E+04	7.603E+01	P 2.298
6		200.0	199.8	9.868E+04	1.511E+02	P 7.841E-01
7	X	8.000E-01				
8						
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10						
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Curve Fit:  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 7.546E-001 \cdot X + 3.473E-001$   
 $X = 1.325E+000 \cdot Y - 4.603E-001$   
 $DL = 4.582E-02$  ppb  
 $BEC = 4.603E-01$  ppb

Weight: OFF  
 Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 118 Sn            115    ppb

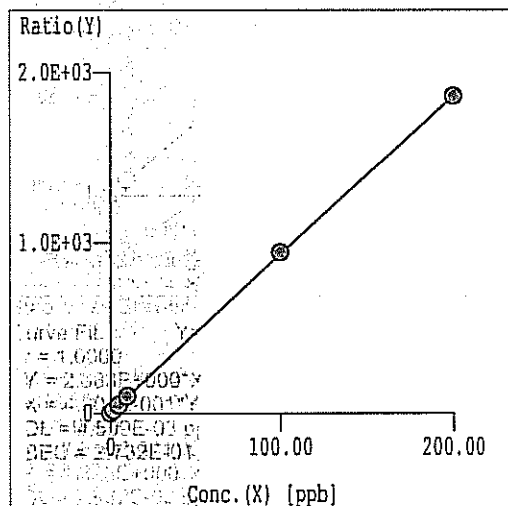


	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-2.132E-01	78.89	1.249E-01	P 2.556
2		2.000	1.900	2846	4.526E+00	P 6.165
3		5.000	4.850	6983	1.067E+01	P 2.381
4		10.00	11.04	1.418E+04	2.356E+01	P 7.396
5		100.0	98.94	1.337E+05	2.066E+02	P 2.809
6		200.0	200.5	2.730E+05	4.181E+02	P 1.233
7	X	8.000E-01				
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Step Mass Element  
 Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 2.083E+000 \cdot X + 5.690E-001$   
 $X = 4.801E-001 \cdot Y - 2.732E-001$   
 $DL = 4.599E-03$  ppb  
 $BEC = 2.732E-01$  ppb

Weight: OFF  
 Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 121 Sb            72    ppb



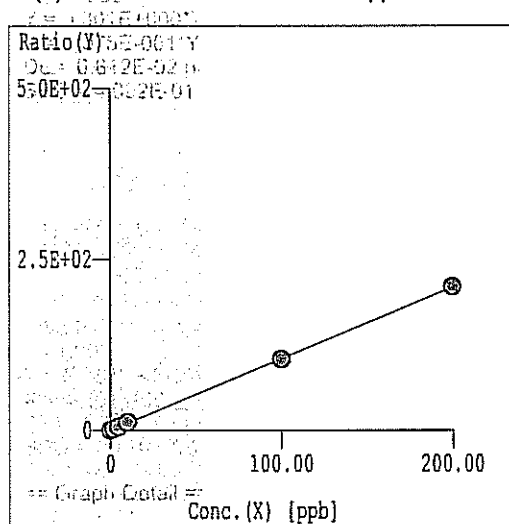
	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-3.325E-01	44.45	7.137E-01	P 29.59
2		2.000	1.659	1179	1.924E+01	P 4.175
3		5.000	4.961	3257	4.995E+01	P 3.047
4		10.00	10.30	6066	9.958E+01	P 3.363
5		100.0	100.9	6.182E+04	9.419E+02	P 9.376E-01
6		200.0	199.6	1.242E+05	1.860E+03	P 5.397E-01
7	X	8.000E-01				
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Step Mass Element  
 Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 9.301E+000 \cdot X + 3.806E+000$   
 $X = 1.075E-001 \cdot Y - 4.092E-001$   
 $DL = 6.812E-02$  ppb  
 $BEC = 4.092E-01$  ppb

Weight: OFF  
 Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 137 Ba            115    ppb

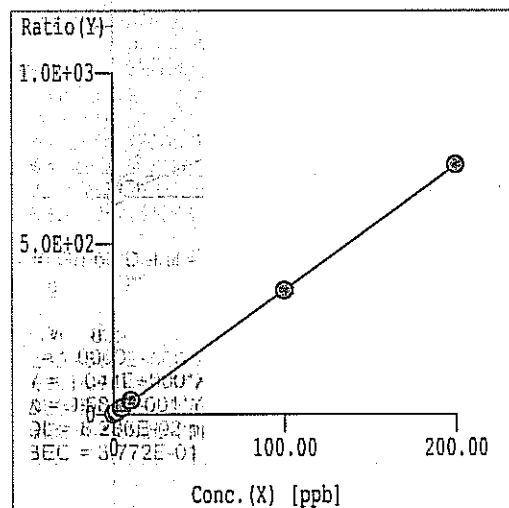


	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	2.349E-01	93.34	1.485E-01	P 19.41
2		2.000	1.867	1471	2.342E+00	P 3.820
3		5.000	4.847	3569	5.453E+00	P 2.169
4		10.00	11.08	7190	1.196E+01	P 8.352
5		100.0	98.99	6.710E+04	1.037E+02	P 3.611
6		200.0	200.5	1.369E+05	2.096E+02	P 8.821E-01
7	X	8.000E-01				
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Curve Fit:  $Y=aX+b$   
 $r=1.0000$   
 $Y=1.044E+000X+3.937E-001$   
 $X=9.581E+001Y-3.772E-001$   
 $DL=8.286E-02$  ppb  
 $BEC=3.772E-01$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 203 Tl            209    ppb



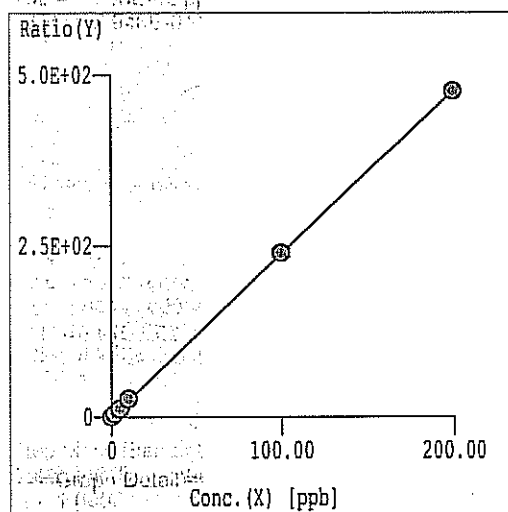
	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	2.295E-01	62.22	2.372E-01	P 15.28
2		2.000	1.750	1939	7.454E+00	P 5.329
3		5.000	4.915	5105	1.899E+01	P 4.547
4		10.00	10.91	1.021E+04	4.084E+01	P 5.606
5		100.0	99.39	9.661E+04	3.634E+02	P 2.465
6		200.0	200.3	1.962E+05	7.311E+02	P 7.280E-01
7	X	8.000E-01				
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Curve Fit:  $Y=aX+b$   
 $r=1.0000$   
 $Y=3.645E+000X+1.074E+000$   
 $X=2.743E+001Y-2.946E-001$   
 $DL=2.983E-02$  ppb  
 $BEC=2.946E-01$  ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element ISTD Unit  
(1) 207 Pb 209 ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-3.836E-01	43.33	1.659E-01	P 14.76
2		2.000	1.679	1319	5.067E+00	P 1.578
3		5.000	4.744	3319	1.235E+01	P 8.431
4		10.00	10.86	6715	2.688E+01	P 6.496
5		100.0	100.3	6.365E+04	2.394E+02	P 2.526
6		200.0	199.8	1.277E+05	4.760E+02	P 4.740E-01
7	X	8.000E-01				
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Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 2.377E+000 * X + 1.078E+000$   
 $X = 4.208E-001 * Y - 4.534E-001$   
 $DL = 3.091E-02$  ppb  
 $BEC = 4.534E-01$  ppb

Weight: OFF  
 Min Conc: 0.000



Last Calib: Feb 28, 2008 03:22 am  
 Calibration Type: External Calibration Method  
 Calibration Title: ICP\_OR5  
 Weighting Method: 1/(SD\*SD)  
 Mass Interpolation Fit for VIS: Point to Point  
 Method: C:\ICPCHEM\1\METHODS\ICP\_OR5.M  
 Multi Tune: #1 022208a5.u  
 #2 022208h1.u

=== Standard Files ===

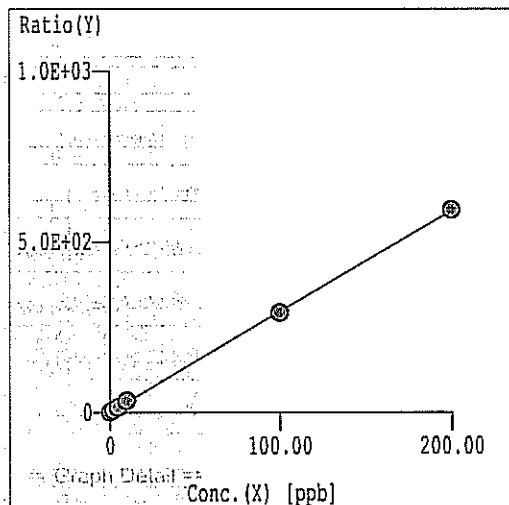
<Data Correction>

Bkg File: —  
 Rejected Masses: —  
 Interference Correction: ON

	Data File	Sample Name	Date Acquired
1	c:\icpchem\1\data\08b2100.b\004calb.d\004calb.d#	CAL BLK	Feb 21 2008 12:02 pm
2	c:\icpchem\1\data\08b2100.b\005cals.d\005cals.d#	2/10/200	Feb 21 2008 12:09 pm
3	c:\icpchem\1\data\08b2100.b\006cals.d\006cals.d#	5/25/500	Feb 21 2008 12:15 pm
4	c:\icpchem\1\data\08b2100.b\007cals.d\007cals.d#	10/50/1000	Feb 21 2008 12:21 pm
5	c:\icpchem\1\data\08b2100.b\008cals.d\008cals.d#	100/500/10000	Feb 21 2008 12:28 pm
6	c:\icpchem\1\data\08b2100.b\009cals.d\009cals.d#	200/1000/20000	Feb 21 2008 12:34 pm
7	—		
8	—		
9	—		
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18	—		
19	—		
20	—		

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 9 Be                  6       ppb

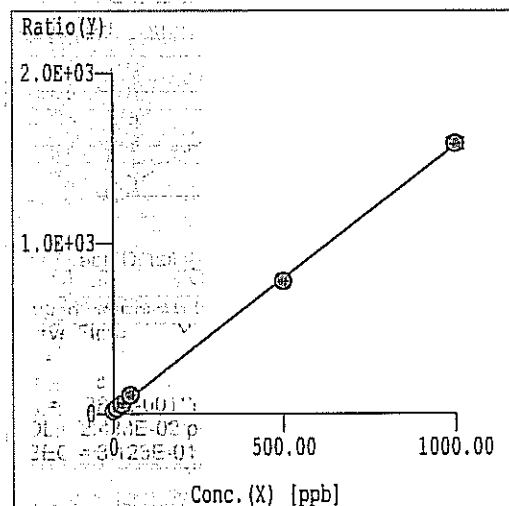


	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-2.927E-01	17.78	5.782E-02	P 41.48
2		2.000	1.892	1931	6.503E+00	P 7.182
3		5.000	4.800	4595	1.508E+01	P 2.401
4		10.00	11.38	1.040E+04	3.451E+01	P 3.184
5		100.0	98.56	8.212E+04	2.917E+02	P 2.087
6		200.0	200.7	1.693E+05	5.930E+02	P 8.357E-01
7	X	8.000E-01				
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Step Mass Element  
Curve Fit:  $Y=aX+b$   
 $r = 0.9999$   
 $Y = 2.951E+000 * X + 9.215E-001$   
 $X = 3.389E-001 * Y - 3.123E-001$   
DL = 2.438E-02 ppb  
BEC = 3.123E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 11 B                  6       ppb



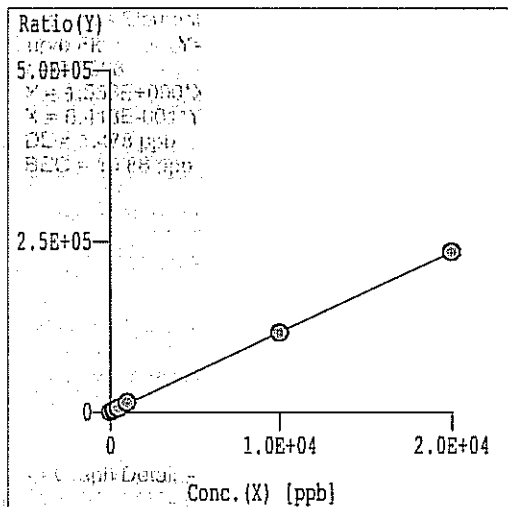
	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-1.053E+00	4685	1.531E+01	P 5.013
2		10.00	9.792	9562	3.221E+01	P 7.571
3		25.00	24.48	1.678E+04	5.509E+01	P 9.564E-01
4		50.00	58.58	3.261E+04	1.082E+02	P 1.535
5		500.0	487.2	2.185E+05	7.761E+02	P 6.548E-01
6		1000	1006	4.523E+05	1.584E+03	P 2.101
7	X	4.000				
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Step Mass Element  
Curve Fit:  $Y=aX+b$   
 $r = 0.9998$   
 $Y = 1.558E+000 * X + 1.695E+001$   
 $X = 6.418E-001 * Y - 1.088E+001$   
DL = 1.478 ppb  
BEC = 10.88 ppb

Weight: OFF  
Min Conc: 0.000

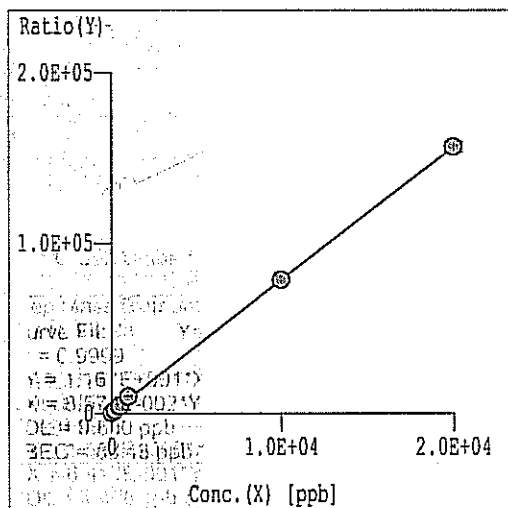
## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 23 Na                72    ppb



Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-5.588E+01	9.183E+04	3.216E+02	P 11.67
2	200.0	160.1	7.822E+05	2.841E+03	M 5.283
3	500.0	479.5	1.887E+06	6.569E+03	A 2.246
4	1000	1166	4.198E+06	1.458E+04	A 1.082
5	1.000E+04	9915	3.195E+07	1.167E+05	A 1.538
6	2.000E+04	2.004E+04	6.669E+07	2.348E+05	A 1.895
7	X 80.00				
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Step Mass Element      ISTD    Unit  
(1) 24 Mg                72    ppb



Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-6.920E+01	6.336E+04	2.223E+02	P 31.65
2	200.0	141.9	5.138E+05	1.866E+03	P 4.134
3	500.0	472.9	1.277E+06	4.443E+03	A 1.279
4	1000	1175	2.851E+06	9.905E+03	A 8.960E-01
5	1.000E+04	9974	2.147E+07	7.841E+04	A 1.620
6	2.000E+04	2.001E+04	4.446E+07	1.565E+05	A 1.851
7	X 80.00				
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Step Mass Element      ISTD    Unit  
(1) 24 Mg                72    ppb

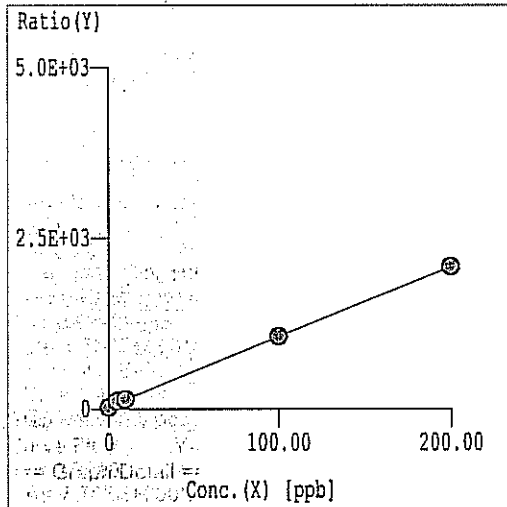
Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

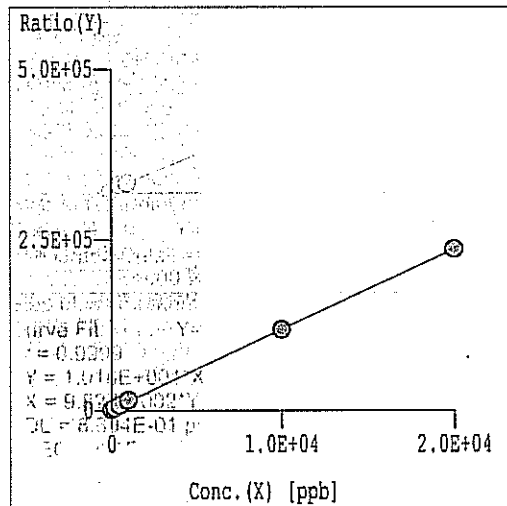
Y = 7.245E-0001

Step Mass Element

(1) 27 Al

ISTD Unit  
72 ppb

	Rtct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-1.862E+00	6660	2.333E+01	P 12.20
2	X	2.000		1.157E+04	4.201E+01	P 4.585
3		5.000	7.267	3.340E+04	1.162E+02	P 1.787
4		10.00	9.693	4.057E+04	1.409E+02	P 1.724
5		100.0	99.89	2.900E+05	1.059E+03	P 9.659E-01
6		200.0	200.0	5.902E+05	2.078E+03	P 1.637
7	X	8.000E-01				
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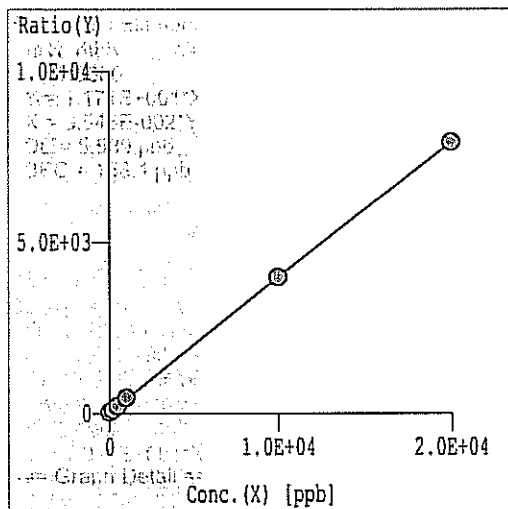
Weight: OFF  
Min Conc: 0.000Step Mass Element  
(1) 39 KISTD Unit  
72 ppb

	Rtct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-5.823E+01	3.351E+05	1.172E+03	P 1.860
2		200.0	171.6	1.064E+06	3.863E+03	A 3.169
3		500.0	478.4	2.142E+06	7.454E+03	A 1.014
4		1000	1140	4.376E+06	1.520E+04	A 3.232E-01
5		1.000E+04	9948	3.241E+07	1.183E+05	A 5.925E-01
6		2.000E+04	2.002E+04	6.710E+07	2.362E+05	A 1.872
7	X	80.00				
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Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 44 Ca                72    ppb

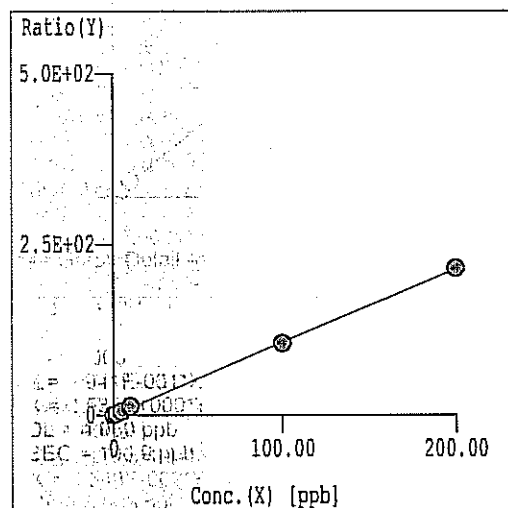


	Rict	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-1.939E+01	9859	3.448E+01	P 1.543
2		200.0	174.4	3.053E+04	1.108E+02	P 3.867
3		500.0	475.2	6.590E+04	2.294E+02	P 3.072
4		1000	1082	1.349E+05	4.686E+02	P 5.489E-01
5		1.000E+04	9982	1.089E+06	3.976E+03	A 2.098
6		2.000E+04	2.001E+04	2.252E+06	7.926E+03	A 7.979E-01
7	X	80.00				
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Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 3.941E-001 * X + 4.213E+001$   
 $X = 2.538E+000 * Y - 1.069E+002$   
 $DL = 4.050 \text{ ppb}$   
 $BEC = 106.9 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 47 Ti                72    ppb



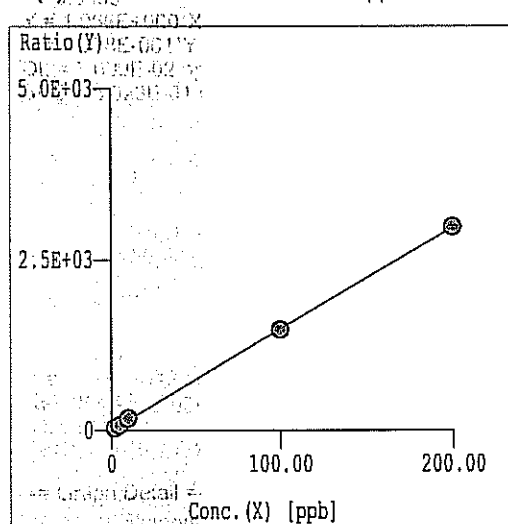
	Rict	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-2.437E-01	17.78	6.259E-02	P 49.40
2		2.000	1.885	642.3	2.333E+00	P 5.689
3		5.000	4.766	1552	5.405E+00	P 3.878
4		10.00	11.75	3699	1.285E+01	P 6.168
5		100.0	97.85	2.867E+04	1.047E+02	P 1.463
6		200.0	201.0	6.098E+04	2.147E+02	P 1.476
7	X	8.000E-01				
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Curve Fit:  $Y = aX + b$   
 $r = 0.9999$   
 $Y = 1.066E+000 * X + 3.224E-001$   
 $X = 9.378E-001 * Y - 3.023E-001$   
 $DL = 8.699E-02 \text{ ppb}$   
 $BEC = 3.023E-01 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

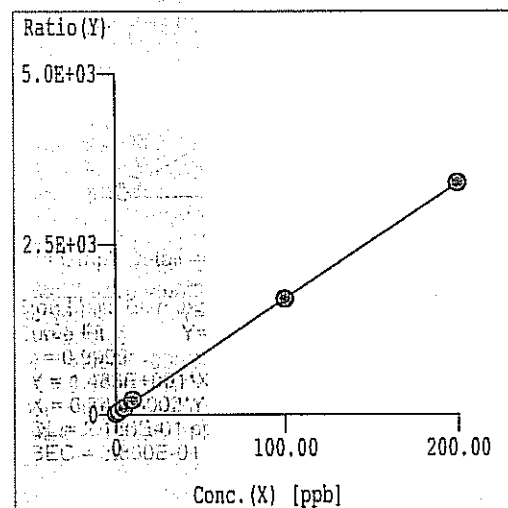
Step Mass Element      ISTD    Unit  
(2) 51.V                72    ppb



Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-3.994E-01	-1.910E+01	-1.995E-01	P 5.416E+02
2	2.000	1.658	2734	3.033E+01	P 4.786
3	5.000	4.794	7054	7.685E+01	P 5.146
4	10.00	11.57	1.664E+04	1.774E+02	P 2.578
5	100.0	98.89	1.323E+05	1.473E+03	P 5.844E-01
6	200.0	200.5	2.758E+05	2.980E+03	P 2.763E-01
7	X 8.000E-01				
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20					

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(2) 52 Cr                72    ppb

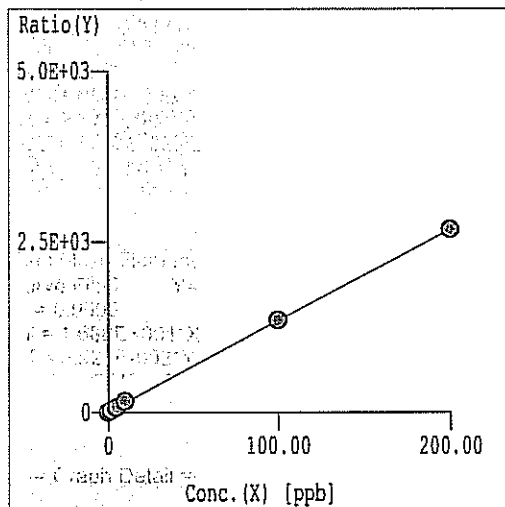


Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-6.086E-01	791.2	8.549E+00	P 5.775
2	2.000	1.573	4090	4.537E+01	P 2.559
3	5.000	4.699	9005	9.815E+01	P 1.610
4	10.00	11.73	2.034E+04	2.169E+02	P 2.747
5	100.0	99.36	1.524E+05	1.696E+03	P 9.717E-01
6	200.0	200.2	3.146E+05	3.399E+03	P 8.972E-01
7	X 8.000E-01				
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Weight: OFF  
Min Conc: 0.000

=== Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 55 Mn                72     ppb



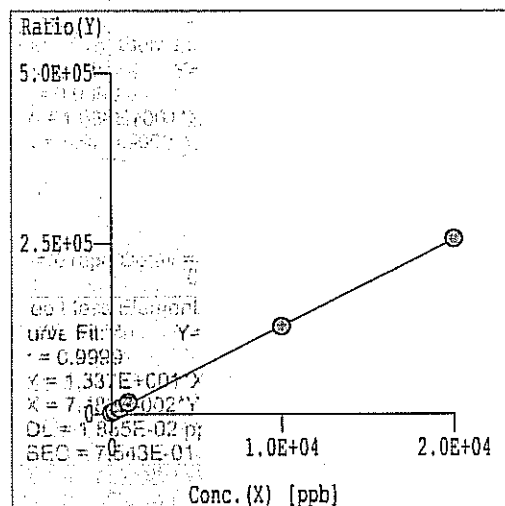
	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-6.770E-01	95.56	1.033E+00	P 8.132
2		2.000	1.437	2638	2.929E+01	P 4.993
3		5.000	4.633	6607	7.200E+01	P 8.637E-01
4		10.00	11.56	1.544E+04	1.646E+02	P 1.640
5		100.0	100.2	1.212E+05	1.349E+03	P 1.632
6		200.0	199.8	2.481E+05	2.681E+03	P 1.531
7	X	8.000E-01				
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Step Mass Element  
Curve Fit:  $Y=aX+b$   
 $r = 0.9999$   
 $Y = 1.337E+001 * X + 1.008E+001$   
 $X = 7.482E-002 * Y - 7.543E-001$   
 $DL = 1.885E-02$  ppb  
 $BEC = 7.543E-01$  ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
E+00 P 8.132  
E+01 P 4.993  
E+01 P 8.637E-01  
E+02 P 1.640  
E+03 P 1.632  
E+03 P 1.531

Step Mass Element      ISTD    Unit  
(1) 56 Fe                72     ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-5.873E+01	3.605E+05	1.261E+03	P 1.367
2		200.0	176.1	1.169E+06	4.244E+03	A 3.395
3		500.0	476.2	2.315E+06	8.057E+03	A 2.067
4		1000	1156	4.804E+06	1.669E+04	A 6.782E-01
5		1.000E+04	9916	3.505E+07	1.280E+05	A 1.183
6		2.000E+04	2.004E+04	7.288E+07	2.566E+05	A 1.253
7	X	80.00				
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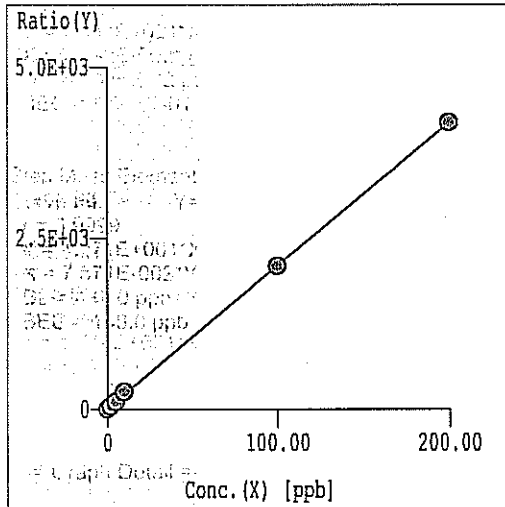
Step Mass Element  
Curve Fit:  $Y=aX+b$   
 $r = 0.9999$   
 $Y = 1.271E+001 * X + 2.007E+003$   
 $X = 7.871E-002 * Y - 1.580E+002$   
 $DL = 4.070$  ppb  
 $BEC = 158.0$  ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
E+03 P 1.367  
E+03 A 3.395  
E+03 A 2.067  
E+04 A 6.782E-01  
E+05 A 1.183

=== Graph Detail ===

Step Mass Element  
(2) 59 Co ISTD Unit  
72 ppb



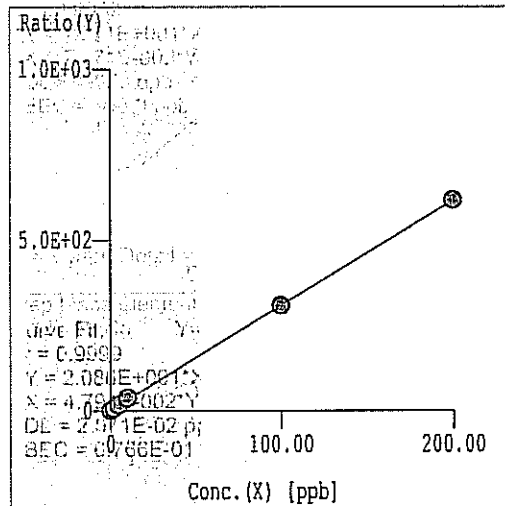
	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-6.479E-01	55.56	5.998E-01	P 24.01
2		2.000	1.536	4162	4.617E+01	P 1.721
3		5.000	4.733	1.035E+04	1.128E+02	P 7.750E-02
4		10.00	11.67	2.415E+04	2.575E+02	P 5.057E-01
5		100.0	99.56	1.879E+05	2.091E+03	P 1.429
6		200.0	200.1	3.878E+05	4.189E+03	P 9.848E-01
7	X	8.000E-01				
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Step Mass Element  
Curve Fit:  $Y = aX + b$   
 $r = 0.9999$   
 $Y = 2.086E+001 * X + 1.411E+001$   
 $X = 4.794E-002 * Y - 6.766E-001$   
 $DL = 2.071E-02 \text{ ppb}$   
 $BEC = 6.766E-01 \text{ ppb}$

Weight: OFF  
Min Conc: 0.000

RSD [%]  
P 24.01  
P 1.721  
P 7.750E-02  
P 5.057E-01  
P 1.429  
P 9.848E-01

Step Mass Element  
(1) 60 Ni ISTD Unit  
72 ppb



	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-6.415E-01	175.6	6.147E-01	P 9.783
2		2.000	1.490	1971	7.154E+00	P 1.337
3		5.000	4.882	5049	1.756E+01	P 5.524
4		10.00	11.49	1.089E+04	3.781E+01	P 1.811
5		100.0	99.70	8.446E+04	3.084E+02	P 1.274
6		200.0	200.1	1.751E+05	6.163E+02	P 1.086
7	X	8.000E-01				
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Step Mass Element  
Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 3.067E+000 * X + 2.582E+000$   
 $X = 3.260E-001 * Y - 8.419E-001$   
 $DL = 5.882E-02 \text{ ppb}$   
 $BEC = 8.419E-01 \text{ ppb}$

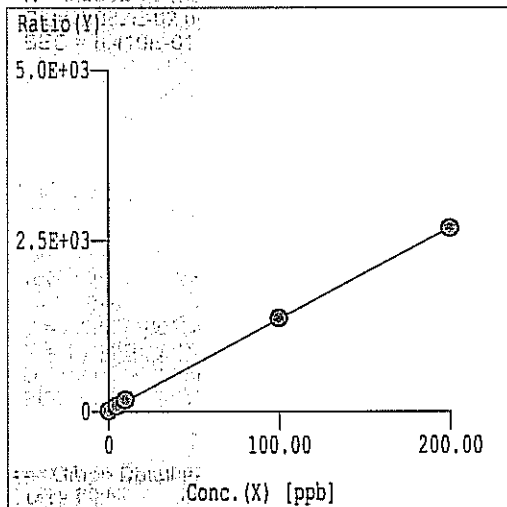
Weight: OFF  
Min Conc: 0.000

RSD [%]  
P 9.783  
P 1.337  
P 5.524  
P 1.811  
P 1.274  
P 1.086



## === Graph Detail ===

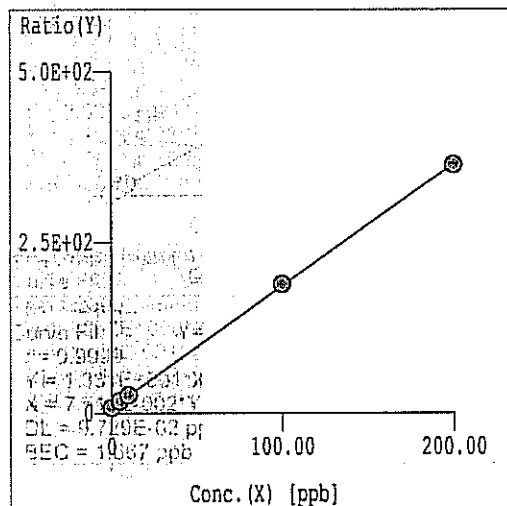
Step Mass Element  
(2) 63 Cu  
ISTD 72 Unit  
ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-1.075E+00	730.0	7.884E+00	P 5.477
2	X	2.000		3293	3.657E+01	P 6.652
3		5.000	4.502	7536	8.214E+01	P 1.450
4		10.00	11.24	1.611E+04	1.719E+02	P 2.350E-01
5		100.0	100.8	1.225E+05	1.364E+03	P 4.748E-01
6		200.0	199.6	2.480E+05	2.679E+03	P 1.127
7	X	8.000E-01				
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Weight: OFF  
Min Conc: 0.000

Step Mass Element  
(1) 66 Zn  
ISTD 72 Unit  
ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-5.942E-01	2145	7.505E+00	P 4.878
2	X	2.000		2565	9.307E+00	P 4.724
3		5.000	5.084	5059	1.760E+01	P 1.532
4		10.00	9.971	7570	2.630E+01	P 1.744
5		100.0	101.1	5.159E+04	1.883E+02	P 1.183
6		200.0	199.5	1.032E+05	3.633E+02	P 1.162E-01
7	X	8.000E-01				
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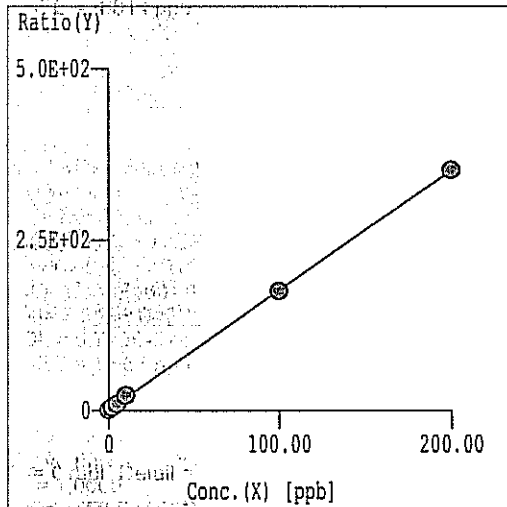
Weight: OFF  
Min Conc: 0.000

Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 1.779E+000 * X + 8.562E+000$   
 $X = 5.622E-001 * Y - 4.814E+000$   
 $DL = 6.174E-01$  ppb  
 $BEC = 4.814$  ppb

RSD [%]  
 E+00 P 4.878  
 E+00 P 4.724  
 E+01 P 1.532  
 E+01 P 1.744  
 E+02 P 1.183  
 E+02 P 1.162E-01

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 75 As                72    ppb

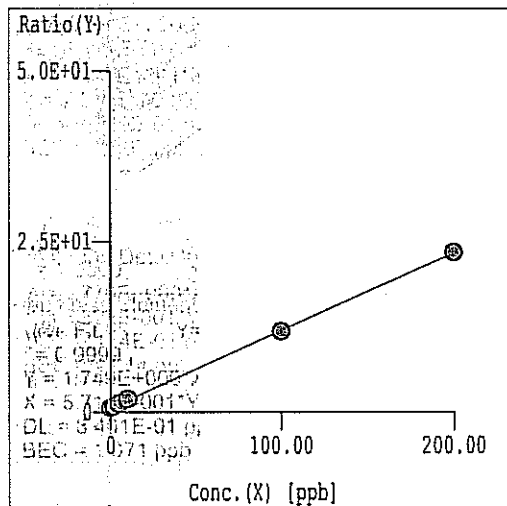


Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-4.721E-01	96.67	1.047E+00	P 46.80
2	2.000	1.622	425.6	4.711E+00	P 10.78
3	5.000	4.622	913.4	9.960E+00	P 8.469
4	10.00	11.76	2105	2.245E+01	P 6.142E-01
5	100.0	99.09	1.574E+04	1.752E+02	P 7.966E-01
6	200.0	200.4	3.262E+04	3.524E+02	P 1.297
7	X 8.000E-01				
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Curve Fit:  $Y=aX+b$   
 $r = 0.9999$   
 $Y = 1.749E+000 \cdot X + 1.873E+000$   
 $X = 5.716E-001 \cdot Y - 1.071E+000$   
 $DL = 8.401E-01$  ppb  
 $BEC = 1.071$  ppb

Weight: OFF  
 Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 82 Se                72    ppb



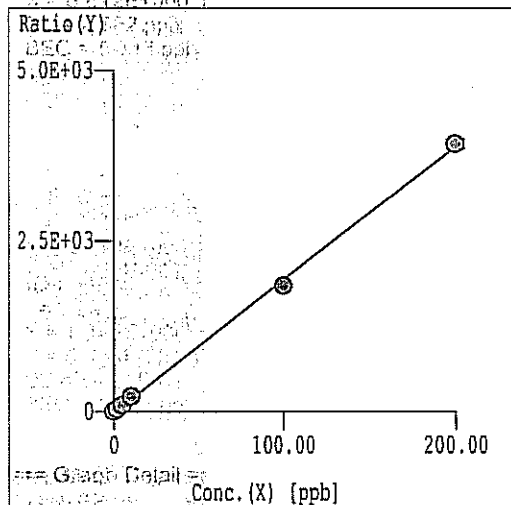
Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-2.506E-01	177.0	6.199E-01	P 15.57
2	2.000	1.635	230.0	8.338E-01	P 3.918
3	5.000	5.398	361.9	1.261E+00	P 9.169
4	10.00	11.02	546.7	1.899E+00	P 3.677
5	100.0	98.51	3241	1.183E+01	P 2.401
6	200.0	200.7	6654	2.342E+01	P 7.321E-01
7	X 8.000E-01				
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Curve Fit:  $Y=aX+b$   
 $r = 0.9999$   
 $Y = 1.135E-001 \cdot X + 6.483E-001$   
 $X = 8.812E+000 \cdot Y - 5.713E+000$   
 $DL = 2.552$  ppb  
 $BEC = 5.713$  ppb

Weight: OFF  
 Min Conc: 0.000

## === Graph Detail ===

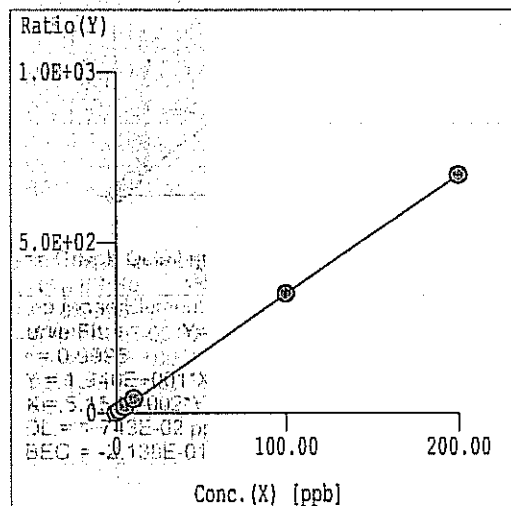
Step Mass Element  
(1) 88 Sr  
ISTD 72 Unit  
ppb



Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	2.579E-01	244.5	8.558E-01	P 13.17
2	2.000	2.289	1.109E+04	4.026E+01	P 1.808
3	5.000	5.263	2.814E+04	9.793E+01	P 2.746
4	10.00	11.68	6.402E+04	2.224E+02	P 5.028E-01
5	100.0	95.21	5.047E+05	1.843E+03	P 1.219
6	200.0	202.3	1.114E+06	3.920E+03	A 1.687
7	X 8.000E-01				
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Weight: OFF  
Min Conc: 0.000

Step Mass Element  
(1) 95 Mo  
ISTD 72 Unit  
ppb



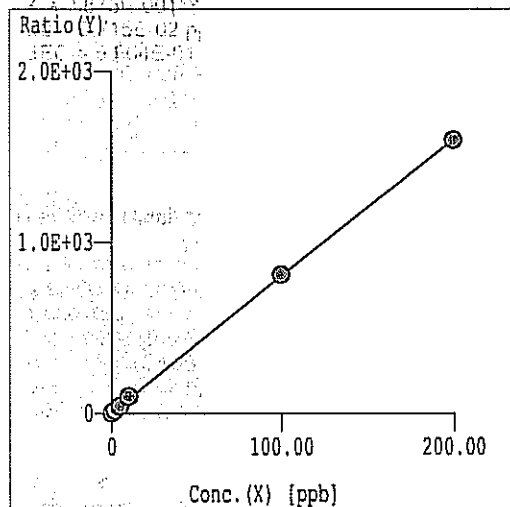
Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-5.695E-01	26.67	9.349E-02	P 33.68
2	2.000	1.563	2069	7.514E+00	P 4.220
3	5.000	4.693	5285	1.840E+01	P 6.139
4	10.00	11.42	1.204E+04	4.181E+01	P 2.207
5	100.0	99.90	9.575E+04	3.496E+02	P 1.725
6	200.0	200.0	1.983E+05	6.978E+02	P 2.745E-01
7	X 8.000E-01				
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Weight: OFF  
Min Conc: 0.000

Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 3.479E+000 * X + 2.075E+000$   
 $X = 2.875E-001 * Y - 5.964E-001$   
 $DL = 2.715E-02$  ppb  
 $BEC = 5.964E-01$  ppb

## === Graph Detail ===

Step Mass Element  
(1) 109 Ag  
ISTD 72  
Unit ppb

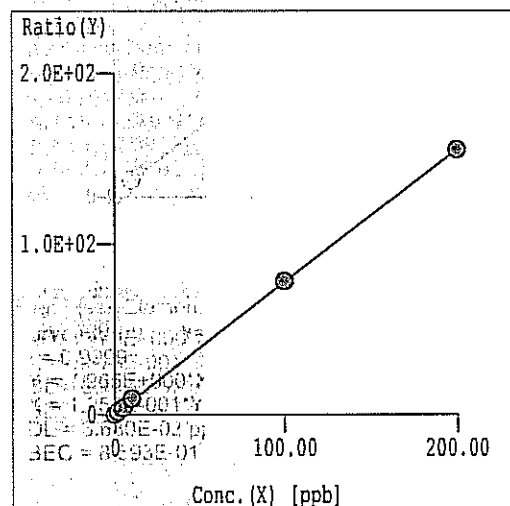


Curve Fitt.  $Y=aX+b$   
 $r = 0.9999$   
 $Y = 7.965E+000 \cdot X + 6.845E+000$   
 $X = 1.255E-001 \cdot Y - 8.593E-001$   
DL = 3.680E-02 ppb  
BEC = 8.593E-01 ppb

Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-8.100E-01	112.2	3.925E-01	P 24.90
2	2.000	1.364	4881	1.771E+01	P 1.274
3	5.000	4.552	1.239E+04	4.311E+01	P 2.796
4	10.00	11.59	2.855E+04	9.917E+01	P 1.703
5	100.0	100.7	2.216E+05	8.092E+02	P 9.962E-01
6	200.0	199.6	4.536E+05	1.597E+03	P 7.477E-01
7	X 8.000E-01				
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Weight: OFF  
Min Conc: 0.000

Step Mass Element  
(1) 111 Cd  
ISTD 115  
Unit ppb



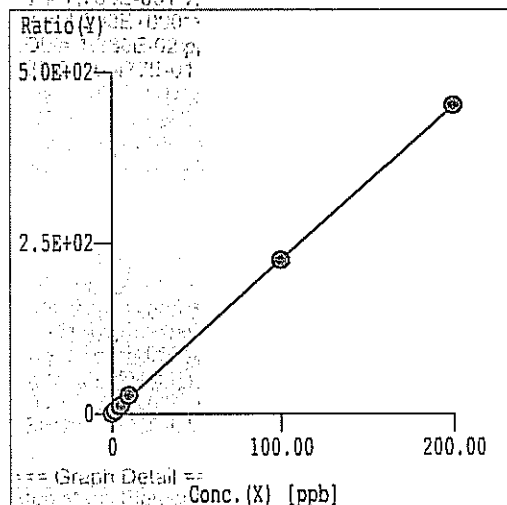
Curve Fitt.  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 7.735E-001 \cdot X + 5.010E-001$   
 $X = 1.293E+000 \cdot Y - 6.477E-001$   
DL = 1.386E-02 ppb  
BEC = 6.477E-01 ppb

Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-6.336E-01	7.037	1.091E-02	P 32.74
2	2.000	1.546	1050	1.697E+00	P 4.408
3	5.000	4.499	2567	3.981E+00	P 4.406
4	10.00	11.48	6047	9.380E+00	P 8.348E-01
5	100.0	100.3	4.741E+04	7.810E+01	P 1.584
6	200.0	199.8	9.753E+04	1.550E+02	P 6.481E-01
7	X 8.000E-01				
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Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element  
(1) 118 Sn  
ISTD 115  
Unit ppb



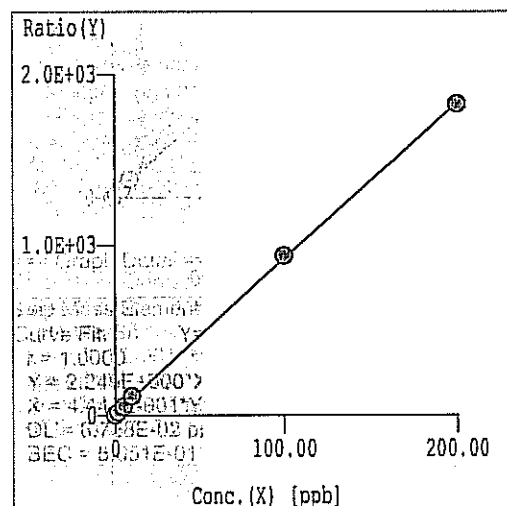
Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-5.200E-01	65.56	1.014E-01	P 49.73
2	2.000	1.556	2947	4.769E+00	P 6.192
3	5.000	4.770	7734	1.200E+01	P 4.994
4	10.00	11.48	1.746E+04	2.708E+01	P 2.983
5	100.0	99.56	1.367E+05	2.252E+02	P 1.728
6	200.0	200.2	2.840E+05	4.514E+02	P 7.141E-01
7	X 8.000E-01				
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Step Mass Element  
Curve Fit: Sn Y=aX+b  
r = 1.0000E+00  
Y = 2.249E+000\*X + 1.271E+000  
X = 4.447E-001\*Y - 5.651E-001  
DL = 6.728E-02 ppb  
BEC = 5.651E-01 ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
E-01 P 49.73  
E+00 P 6.192  
E+01 P 4.994  
E+01 P 2.983  
E+02 P 1.728  
E+02 P 7.141E-01

Step Mass Element  
(2) 121 Sb  
ISTD 72  
Unit ppb



Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-9.282E-01	56.67	6.132E-01	P 24.61
2	2.000	1.179	1789	1.984E+01	P 1.939
3	5.000	4.616	4696	5.119E+01	P 2.411
4	10.00	11.37	1.058E+04	1.128E+02	P 1.964
5	100.0	101.6	8.411E+04	9.362E+02	P 6.940E-01
6	200.0	199.1	1.690E+05	1.826E+03	P 1.090
7	X 8.000E-01				
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Step Mass Element  
Curve Fit: Sb Y=aX+b  
r = 0.9999  
Y = 9.123E+000\*X + 9.082E+000  
X = 1.096E-001\*Y - 9.955E-001  
DL = 4.962E-02 ppb  
BEC = 9.955E-01 ppb

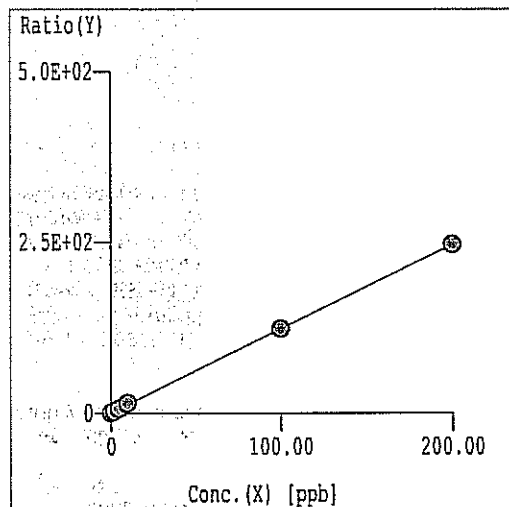
Weight: OFF  
Min Conc: 0.000

RSD [%]  
E-01 P 24.61  
E+01 P 1.939  
E+01 P 2.411  
E+02 P 1.964  
E+02 P 6.940E-01  
E+03 P 1.090

## === Graph Detail ===

Step Mass Element  
(1) 137 Ba

ISTD Unit  
115 ppb



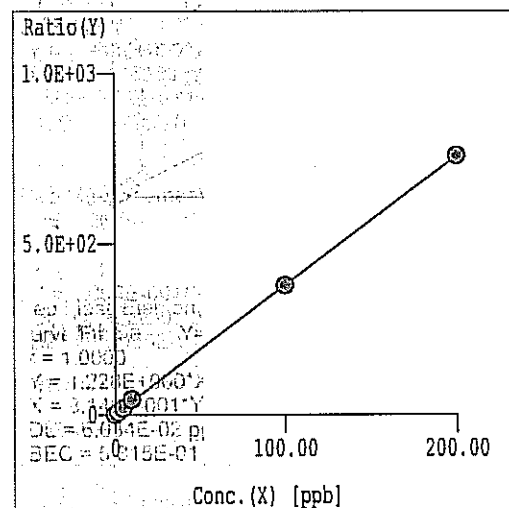
	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	4.794E-01	41.11	6.403E-02	P 38.59
2		2.000	1.599	1618	2.617E+00	P 4.944
3		5.000	4.685	4133	6.408E+00	P 4.152
4		10.00	11.41	9456	1.467E+01	P 3.229E-01
5		100.0	99.69	7.474E+04	1.231E+02	P 1.852
6		200.0	200.1	1.550E+05	2.465E+02	P 9.729E-01
7	X	8.000E-01				
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Curve Fit:  $Y=aX+b$   
 $r=1.0000$   
 $Y=1.228E+000*X+6.529E-001$   
 $X=8.140E-001*Y-5.315E-001$   
 $DL=6.034E-02$  ppb  
 $BEC=5.315E-01$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element  
(1) 203 Ti

ISTD Unit  
209 ppb



	Rt	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	4.898E-01	35.56	7.176E-02	P 30.64
2		2.000	1.585	3776	7.909E+00	P 4.390
3		5.000	4.702	9692	1.968E+01	P 3.146
4		10.00	11.48	2.227E+04	4.529E+01	P 1.375
5		100.0	99.57	1.722E+05	3.780E+02	P 1.485
6		200.0	200.2	3.500E+05	7.579E+02	P 2.305E-01
7	X	8.000E-01				
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Curve Fit:  $Y=aX+b$   
 $r=1.0000$   
 $Y=3.777E+000*X+1.922E+000$   
 $X=2.648E-001*Y-5.088E-001$   
 $DL=1.746E-02$  ppb  
 $BEC=5.088E-01$  ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

DE=3.237E-02 ppb

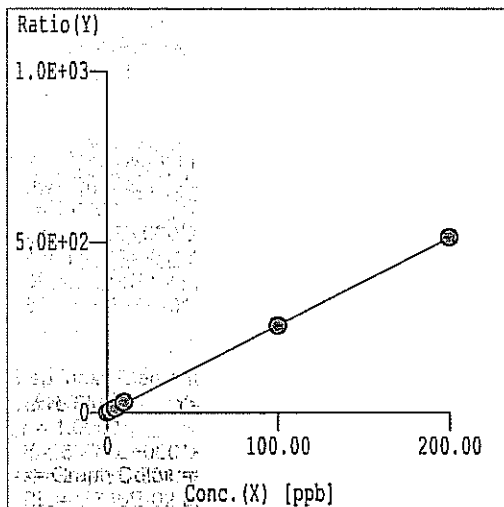
Step: Mass Element

ISTD Unit

(1) 207 Pb

209

ppb



Step: Mass Element

Curve Fit:  $Y = aX + b$  $r = 0.9999$  $Y = 2.557E+000 * X + 1.165E+000$  $X = 3.910E-001 * Y - 4.557E-001$ 

DE = 3.237E-02 ppb

BEC = 4.557E-01 ppb

Weight: OFF

Min Conc: 0.000

	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-3.954E-01	76.67	1.542E-01	P 17.89
2		2.000	1.677	2605	5.454E+00	P 4.901
3		5.000	4.600	6367	1.293E+01	P 4.316
4		10.00	11.55	1.510E+04	3.071E+01	P 1.032
5		100.0	99.26	1.162E+05	2.550E+02	P 8.069E-01
6		200.0	200.3	2.371E+05	5.134E+02	P 1.162
7	X	8.000E-01				
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Last Callb: Feb 28, 2008 03:22 am  
 Calibration Type: External Calibration Method  
 Calibration Title: ICP\_OR.S  
 Weighting Method: 1/(SD\*SD)  
 Mass Interpolation Fit for VIS: Point to Point  
 Method: C:\ICPCHEM\1\METHODS\ICP\_OR.S.M  
 Multi Tune: #1 022208a5.u  
 #2 022208h1.u

## === Standard Files ===

&lt;Data Correction&gt;

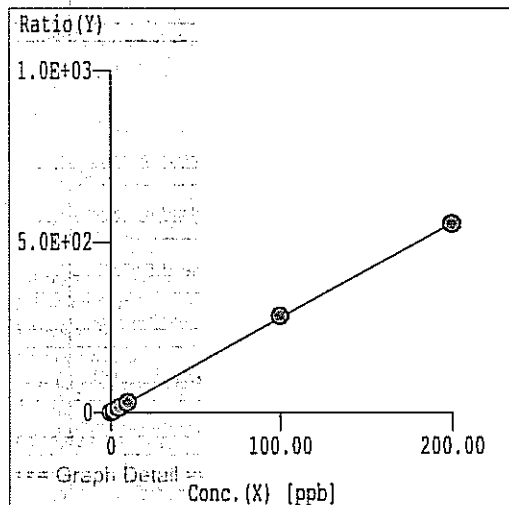
Bkg File: ---  
 Rejected Masses: ---  
 Interference Correction: ON

	Data File	Sample Name	Date Acquired
1	c:\icpchem\1\data\08b21\00.b\117calb.d\117calb.d#	CAL BLK	Feb 21 2008 11:58 pm
2	c:\icpchem\1\data\08b21\00.b\118cals.d\118cals.d#	2/10/200	Feb 22 2008 12:04 am
3	c:\icpchem\1\data\08b21\00.b\119cals.d\119cals.d#	5/25/500	Feb 22 2008 12:11 am
4	c:\icpchem\1\data\08b21\00.b\120cals.d\120cals.d#	10/50/1000	Feb 22 2008 12:17 am
5	c:\icpchem\1\data\08b21\00.b\121cals.d\121cals.d#	100/500/10000	Feb 22 2008 12:23 am
6	c:\icpchem\1\data\08b21\00.b\122cals.d\122cals.d#	200/1000/20000	Feb 22 2008 12:29 am
7	---	---	---
8	---	---	---
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19	---	---	---
20	---	---	---



## === Graph Detail ===

Step Mass Element  
(1) 9 Be ISTD Unit  
6 ppb

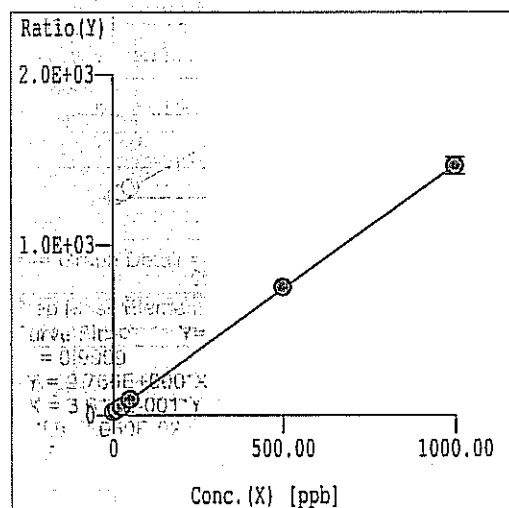


	Rlct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	4.155E-01	61.11	2.753E-01	P 23.61
2		2.000	1.478	1248	5.513E+00	P 5.282
3		5.000	4.808	3435	1.472E+01	P 2.099
4		10.00	10.32	6860	2.998E+01	P 1.050
5		100.0	101.6	6.275E+04	2.825E+02	P 2.399
6		200.0	199.2	1.268E+05	5.523E+02	P 1.793
7	X	8.000E-01				
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Step Mass Element  
Curve Fit:  $Y=aX+b$   
 $r = 0.9999$   
 $Y = 2.766E+000 * X + 1.424E+000$   
 $X = 3.616E-001 * Y - 5.150E-001$   
DL = 7.050E-02 ppb  
BEC = 5.150E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element  
(1) 11 B ISTD Unit  
6 ppb



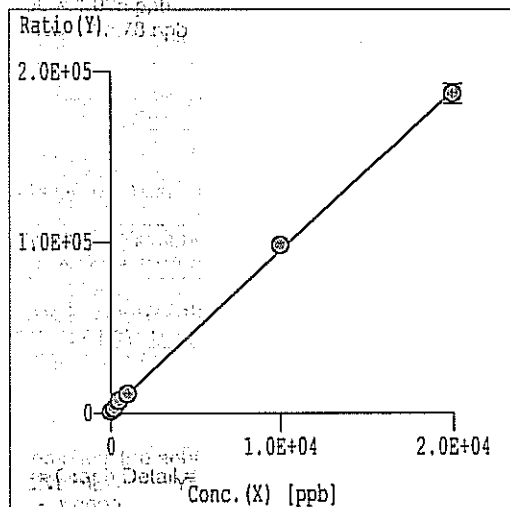
	Rlct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	2.861E-01	4029	1.812E+01	P 2.762
2		10.00	8.478	6982	3.084E+01	P 2.820
3		25.00	22.69	1.201E+04	5.146E+01	P 9.144E-01
4		50.00	51.51	2.134E+04	9.327E+01	P 2.114
5		500.0	505.2	1.670E+05	7.516E+02	P 9.063E-01
6		1000	997.4	3.366E+05	1.466E+03	P 3.415
7	X	4.000				
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Step Mass Element  
Curve Fit:  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 1.451E+000 * X + 1.854E+001$   
 $X = 6.892E-001 * Y - 1.278E+001$   
DL = 1.035 ppb  
BEC = 12.78 ppb

Weight: OFF  
Min Conc: 0.000

## == Graph Detail ==

Step Mass Element  
(1) 23 Na 72 Unit  
ppb

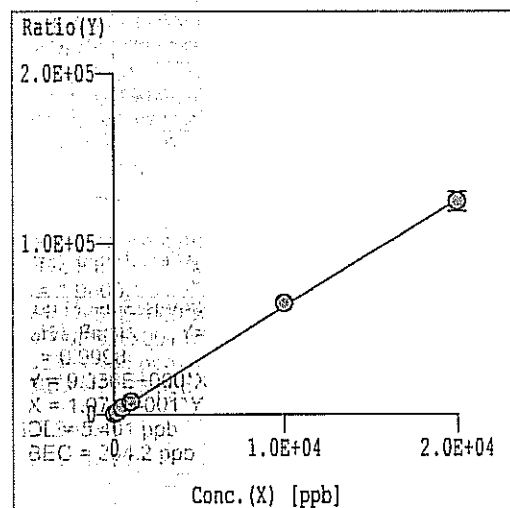


Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-1.185E+02	2.125E+05	8.007E+02	P 2.134
2	200.0	79.69	7.187E+05	2.651E+03	P 3.176
3	500.0	578.1	2.010E+06	7.304E+03	A 2.580E-01
4	1000	1001	3.030E+06	1.125E+04	A 1.624
5	1.000E+04	1.032E+04	2.547E+07	9.826E+04	A 7.862E-01
6	2.000E+04	1.984E+04	5.137E+07	1.871E+05	A 3.101
7	X 80.00				
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Curve Fit:  $Y=aX+b$   
 $r = 0.9998$   
 $Y = 9.336E+000 \cdot X + 1.907E+003$   
 $X = 1.071E-001 \cdot Y - 2.042E+002$   
 $DL = 5.491 \text{ ppb}$   
 $BEC = 204.2 \text{ ppb}$

Weight: OFF  
 Min Conc: 0.000

Step Mass Element  
(1) 24 Mg 72 Unit  
ppb



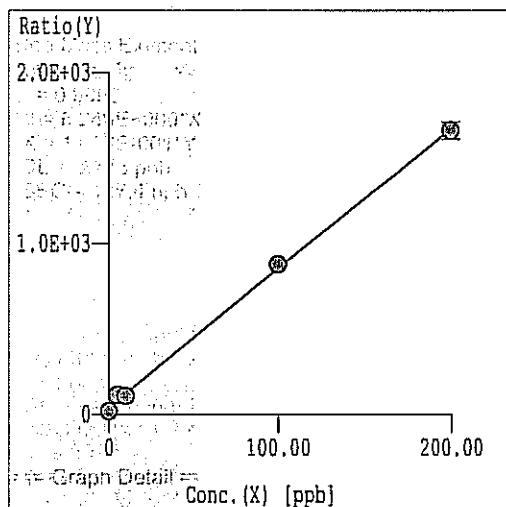
Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-1.039E+02	5.556E+04	2.094E+02	P 3.718
2	200.0	94.22	3.918E+05	1.445E+03	P 2.902
3	500.0	510.3	1.113E+06	4.042E+03	A 6.092E-01
4	1000	1062	2.015E+06	7.484E+03	A 1.349
5	1.000E+04	1.028E+04	1.685E+07	6.500E+04	A 7.396E-01
6	2.000E+04	1.986E+04	3.425E+07	1.248E+05	A 4.562
7	X 80.00				
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Curve Fit:  $Y=aX+b$   
 $r = 0.9998$   
 $Y = 6.240E+000 \cdot X + 8.575E+002$   
 $X = 1.603E-001 \cdot Y - 1.374E+002$   
 $DL = 3.743 \text{ ppb}$   
 $BEC = 137.4 \text{ ppb}$

Weight: OFF  
 Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 27. Al                72      ppb

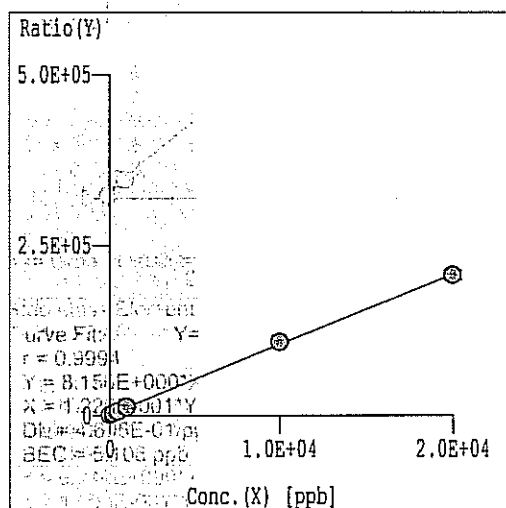


Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	3.051E+00	4443	1.676E+01	P 7.618
2	X 2.000		8581	3.165E+01	P 3.817
3	5.000	8.784	3.118E+04	1.133E+02	P 6.149E-01
4	10.00	7.914	2.859E+04	1.062E+02	P 6.478E-01
5	100.0	102.7	2.279E+05	8.792E+02	P 1.016
6	200.0	198.7	4.562E+05	1.662E+03	P 3.030
7	X 8.000E-01				
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Step Mass Element  
Curve Fit:  $Y=aX+b$   
 $r = 0.9994$   
 $Y = 8.156E+000 * X + 4.164E+001$   
 $X = 1.226E-001 * Y - 5.106E+000$   
 $DL = 4.695E-01$  ppb  
 $BEC = 5.106$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 39. K                72      ppb



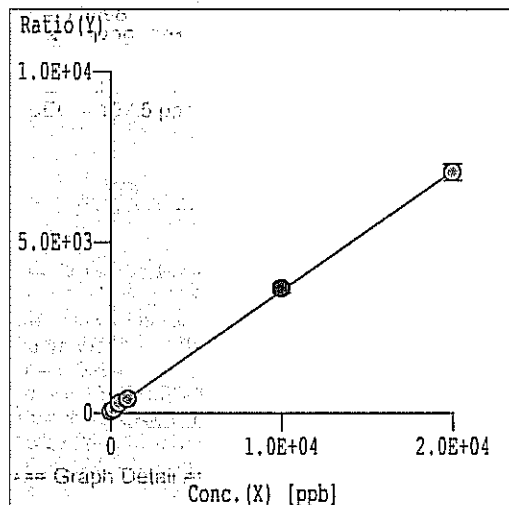
Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	7.517E+01	3.341E+05	1.259E+03	P 1.245
2	200.0	121.2	8.893E+05	3.280E+03	M 5.915
3	500.0	454.5	1.847E+06	6.712E+03	A 1.111
4	1000	1046	3.448E+06	1.280E+04	A 1.332
5	1.000E+04	1.031E+04	2.803E+07	1.081E+05	A 6.366E-01
6	2.000E+04	1.985E+04	5.664E+07	2.063E+05	A 3.220
7	X 80.00				
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Step Mass Element  
Curve Fit:  $Y=aX+b$   
 $r = 0.9998$   
 $Y = 1.029E+001 * X + 2.033E+003$   
 $X = 9.714E-002 * Y - 1.975E+002$   
 $DL = 4.569$  ppb  
 $BEC = 197.5$  ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element  
(1) 44 Ca ISTD Unit  
72 ppb



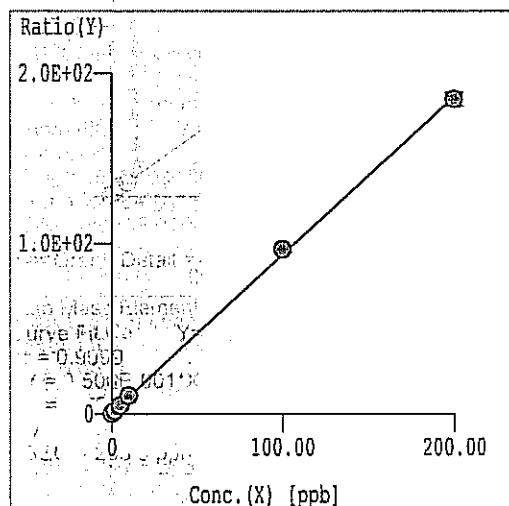
Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-7.243E+01	1.220E+04	4.596E+01	P 1.860
2	200.0	115.5	3.032E+04	1.119E+02	P 1.936
3	500.0	607.0	7.821E+04	2.842E+02	P 5.898E-01
4	1000	952.3	1.091E+05	4.052E+02	P 9.703E-01
5	1.000E+04	1.019E+04	9.455E+05	3.646E+03	M 3.756
6	2.000E+04	1.990E+04	1.935E+06	7.050E+03	A 3.417
7	X 80.00				
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Step Mass Element  
(1) 47 Ti ISTD Unit  
72 ppb

Curve Fit:  $Y = aX + b$   
 $r = 0.9998$   
 $Y = 9.267E-001 * X + 8.746E-001$   
 $X = 1.079E+000 * Y - 9.438E-001$   
DL = 1.353E-01 ppb  
BEC = 9.438E-01 ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element  
(1) 47 Ti ISTD Unit  
72 ppb



Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-7.455E-01	48.89	1.838E-01	P 22.74
2	2.000	1.076	506.7	1.872E+00	P 11.49
3	5.000	4.481	1383	5.027E+00	P 2.070
4	10.00	10.59	2877	1.068E+01	P 2.480
5	100.0	103.2	2.502E+04	9.653E+01	P 1.703
6	200.0	198.4	5.071E+04	1.847E+02	P 2.217
7	X 8.000E-01				
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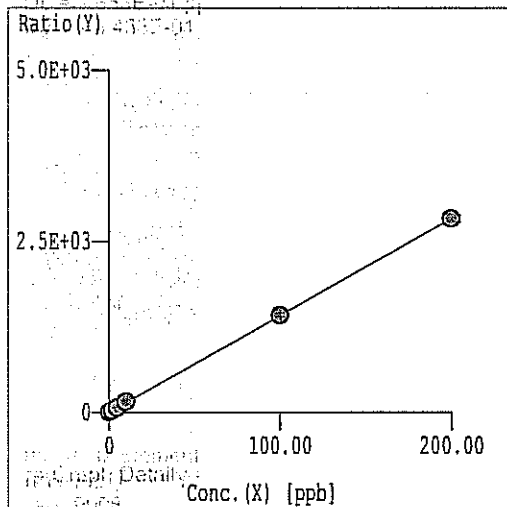
Step Mass Element  
(1) 47 Ti ISTD Unit  
72 ppb

Curve Fit:  $Y = aX + b$   
 $r = 0.9998$   
 $Y = 9.267E-001 * X + 8.746E-001$   
 $X = 1.079E+000 * Y - 9.438E-001$   
DL = 1.353E-01 ppb  
BEC = 9.438E-01 ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element ISTD Unit  
(2) 51 V 72 ppb

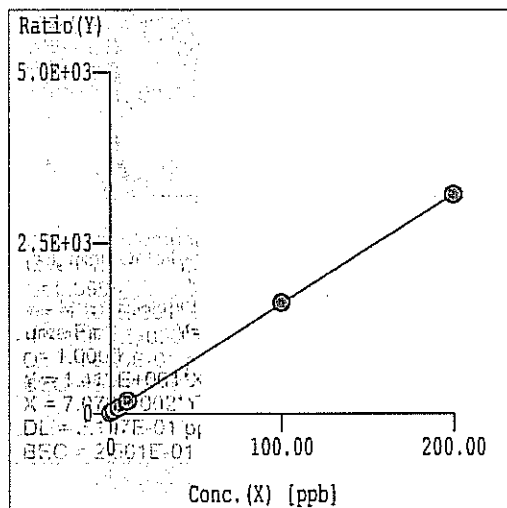


Curve Fit:  $Y=aX+b$   
 $r=1.0000$   
 $Y=1.413E+001 \cdot X + 3.619E+000$   
 $X=7.076E-002 \cdot Y - 2.561E-001$   
 $DL=3.197E-01$  ppb  
 $BEC=2.561E-01$  ppb

	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-1.724E-01	103.4	1.182E+00	P 127.4
2		2.000	1.632	2316	2.669E+01	P 7.607
3		5.000	4.618	6046	6.889E+01	P 3.735
4		10.00	10.86	1.352E+04	1.571E+02	P 3.397
5		100.0	100.2	1.185E+05	1.420E+03	P 1.482
6		200.0	199.9	2.393E+05	2.829E+03	P 1.713
7	X	8.000E-01				
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Weight: OFF  
Min Conc: 0.000

Step Mass Element ISTD Unit  
(2) 52 Cr 72 ppb



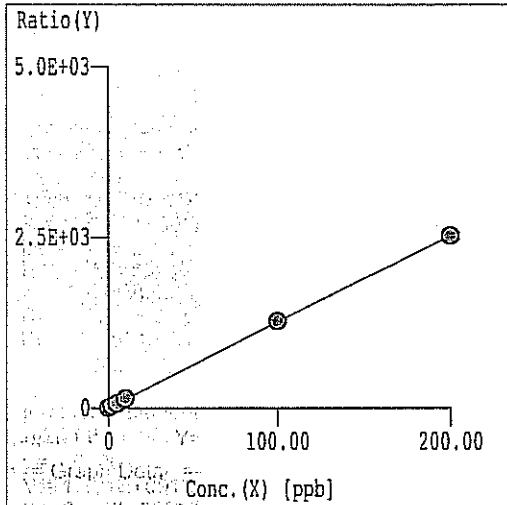
Curve Fit:  $Y=aX+b$   
 $r=1.0000$   
 $Y=1.601E+001 \cdot X + 1.424E+001$   
 $X=6.246E-002 \cdot Y - 8.896E-001$   
 $DL=1.249E-01$  ppb  
 $BEC=8.896E-01$  ppb

	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-3.282E-01	783.4	8.988E+00	P 7.414
2		2.000	1.692	3587	4.134E+01	P 5.567
3		5.000	4.676	7820	8.911E+01	P 3.162
4		10.00	10.68	1.594E+04	1.852E+02	P 1.633
5		100.0	100.6	1.357E+05	1.625E+03	P 1.338
6		200.0	199.7	2.717E+05	3.211E+03	P 1.264
7	X	8.000E-01				
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Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 55 Mn                72    ppb

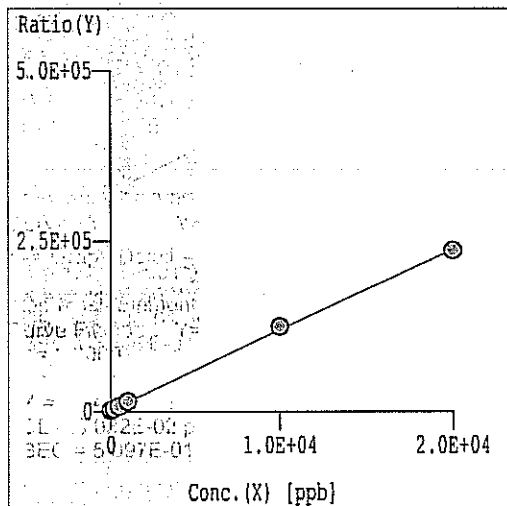


Step Mass Element  
Curve Fit:  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 1.259E+001 * X + 6.417E+000$   
 $X = 7.943E-002 * Y - 5.097E-001$   
DL = 9.082E-02 ppb  
BEC = 5.097E-01 ppb

	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-3.363E-01	190.0	2.183E+00	P 17.46
2		2.000	1.912	2646	3.049E+01	P 12.06
3		5.000	4.665	5719	6.516E+01	P 1.854
4		10.00	10.59	1.203E+04	1.397E+02	P 3.219
5		100.0	100.4	1.061E+05	1.270E+03	P 2.057
6		200.0	199.8	2.133E+05	2.522E+03	P 2.002
7	X	8.000E-01				
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Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 56 Fe                72    ppb



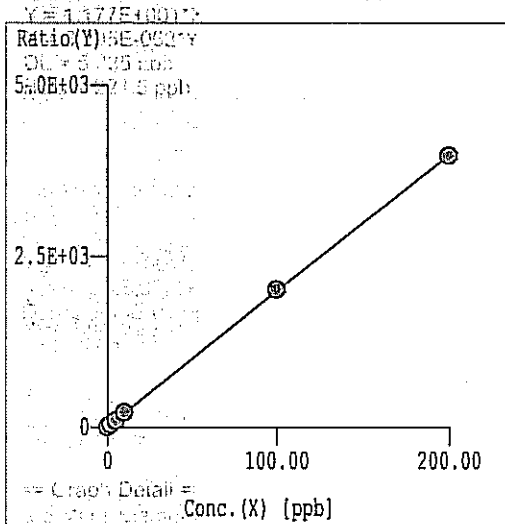
Step Mass Element  
Curve Fit:  $Y=aX+b$   
 $r = 0.9998$   
 $Y = 1.177E+001 * X + 2.608E+003$   
 $X = 8.495E-002 * Y - 2.215E+002$   
DL = 5.335 ppb  
BEC = 221.5 ppb

	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-8.769E+01	4.181E+05	1.575E+03	P 1.329
2		200.0	125.4	1.107E+06	4.084E+03	A 2.365
3		500.0	442.4	2.151E+06	7.815E+03	A 1.299
4		1000	1049	4.026E+06	1.495E+04	A 6.618E-01
5		1.000E+04	1.034E+04	3.223E+07	1.244E+05	A 7.831E-01
6		2.000E+04	1.983E+04	6.480E+07	2.360E+05	A 2.137
7	X	80.00				
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Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element  
(2) 59.Co ISTD Unit  
72 ppb



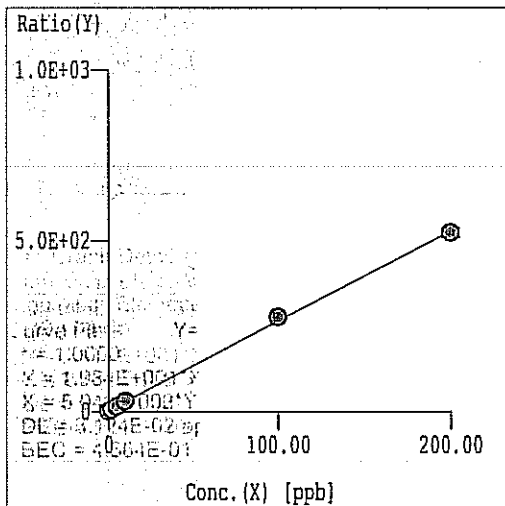
Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-3.683E-01	117.8	1.353E+00	P 15.27
2	2.000	1.754	3773	4.347E+01	P 6.546
3	5.000	4.597	8764	9.987E+01	P 2.333
4	10.00	10.60	1.885E+04	2.190E+02	P 1.405
5	100.0	100.9	1.679E+05	2.010E+03	P 1.648
6	200.0	199.5	3.357E+05	3.968E+03	P 1.214
7	X 8.000E-01				
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9					
10					
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12					
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15					
16					
17					
18					
19					
20					

ppb Mass Element  
Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 1.984E+001 * X + 8.660E+000$   
 $X = 5.040E-002 * Y - 4.364E-001$   
DL = 3.124E-02 ppb  
BEC = 4.364E-01 ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
E-00 P 15.27  
E+01 P 6.546  
E+01 P 2.333  
E+02 P 1.405  
E+03 P 1.648  
E+03 P 1.214

Step Mass Element  
(1) 60.Ni ISTD Unit  
72 ppb



Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-1.028E+00	198.9	7.494E-01	P 17.97
2	2.000	9.797E-01	1635	6.028E+00	P 8.374E-01
3	5.000	4.577	4262	1.548E+01	P 7.337E-01
4	10.00	10.44	8317	3.089E+01	P 1.757
5	100.0	104.1	7.180E+04	2.770E+02	P 1.422
6	200.0	198.0	1.438E+05	5.238E+02	P 2.556
7	X 8.000E-01				
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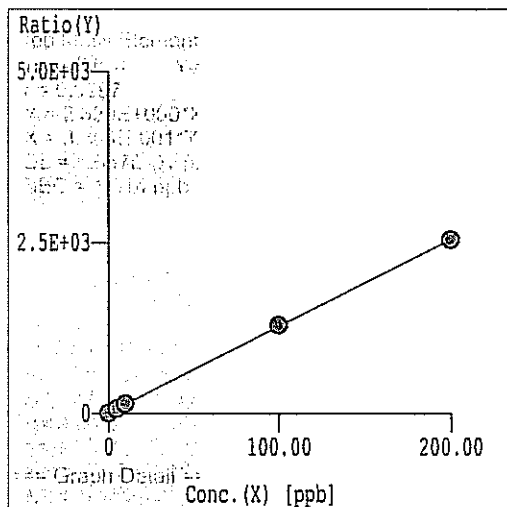
Step Mass Element  
Curve Fit:  $Y = aX + b$   
 $r = 0.9997$   
 $Y = 2.629E+000 * X + 3.453E+000$   
 $X = 3.804E-001 * Y - 1.314E+000$   
DL = 1.537E-01 ppb  
BEC = 1.314 ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
E-01 P 17.97  
E+00 P 8.374  
E+01 P 7.337  
E+01 P 1.757  
E+02 P 1.422  
E+02 P 2.556

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 63 Cu                72    ppb

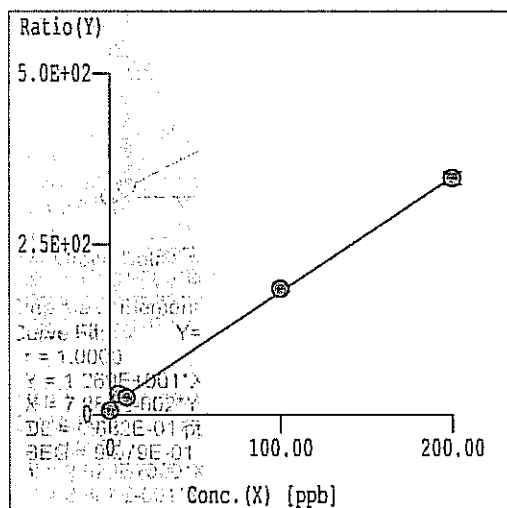


	Rfct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	6.303E-01	406.7	4.662E+00	P 15.26
2	X	2.000		2661	3.066E+01	P 6.765
3		5.000	4.697	6339	7.224E+01	P 3.051
4		10.00	10.44	1.249E+04	1.450E+02	P 2.043
5		100.0	101.0	1.081E+05	1.294E+03	P 1.819
6		200.0	199.5	2.152E+05	2.543E+03	P 1.337
7	X	8.000E-01				
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Step Mass Element  
Curve Fit:  $Y = aX + b$   
 $r = 1.0000$   
 $Y = 1.269E+001 * X + 1.266E+001$   
 $X = 7.883E-002 * Y - 9.979E-001$   
 $DL = 1.682E-01$  ppb  
 $BEC = 9.979E-01$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 66 Zn                72    ppb



	Rfct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	4.060E+00	1430	5.392E+00	P 6.047
2	X	2.000		2372	8.751E+00	P 3.415
3		5.000	10.46	8212	2.985E+01	P 5.668
4		10.00	7.437	6664	2.475E+01	P 9.856E-01
5		100.0	102.3	4.782E+04	1.845E+02	P 2.061
6		200.0	198.8	9.526E+04	3.470E+02	P 2.672
7	X	8.000E-01				
8						
9						
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11						
12						
13						
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16						
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18						
19						
20						

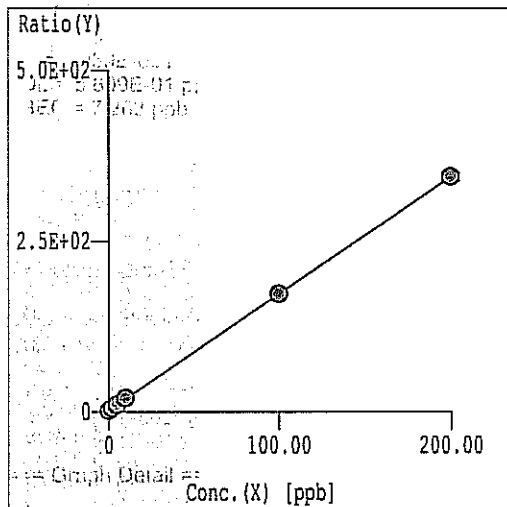
Step Mass Element  
Curve Fit:  $Y = aX + b$   
 $r = 0.9990$   
 $Y = 1.684E+000 * X + 1.223E+001$   
 $X = 5.939E-001 * Y - 7.263E+000$   
 $DL = 5.809E-01$  ppb  
 $BEC = 7.263$  ppb

Weight: OFF  
Min Conc: 0.000



## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(2) 75 As                72    ppb

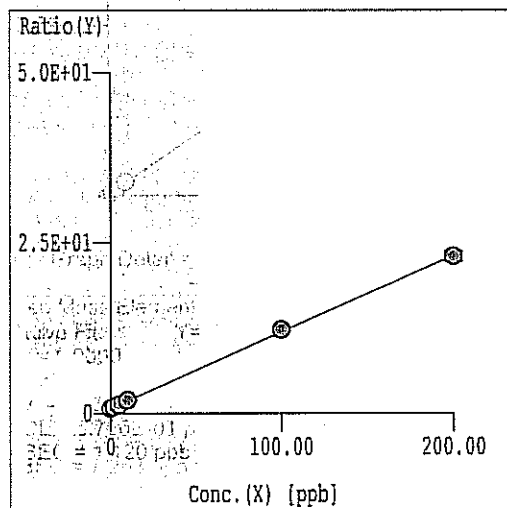


	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-3.827E-01	110.0	1.263E+00	P 26.04
2		2.000	1.945	455.6	5.249E+00	P 5.171
3		5.000	4.862	898.9	1.024E+01	P 4.619
4		10.00	10.68	1739	2.021E+01	P 4.954
5		100.0	99.85	1.444E+04	1.729E+02	P 1.548
6		200.0	200.0	2.915E+04	3.445E+02	P 1.709
7	X	8.000E-01				
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11						
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19						
20						

Step Mass Element  
Curve Fit: As       $Y=aX+b$   
 $r^2=1.0000$   
 $Y=1.713E+000*X+1.918E+000$   
 $X=5.838E-001*Y-1.120E+000$   
 $DL=5.760E-01$  ppb  
 $BEC=1.120$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element      ISTD    Unit  
(1) 82 Se                72    ppb



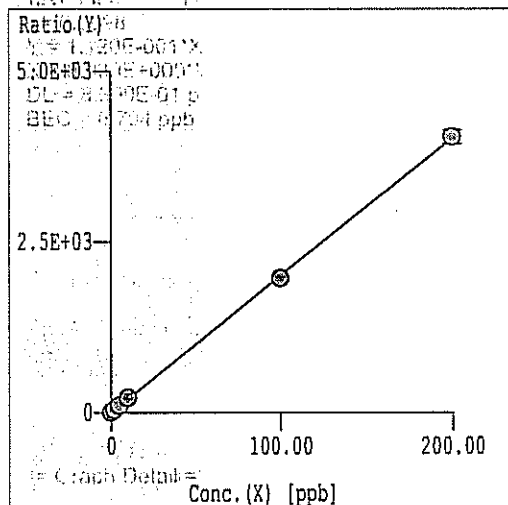
	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-6.814E-01	178.9	6.744E-01	P 4.644
2		2.000	1.456	247.4	9.137E-01	P 9.293
3		5.000	4.374	341.5	1.240E+00	P 5.508
4		10.00	10.54	519.6	1.930E+00	P 5.885
5		100.0	102.6	3173	1.224E+01	P 1.802
6		200.0	198.7	6313	2.300E+01	P 3.269
7	X	8.000E-01				
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19						
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Step Mass Element  
Curve Fit: Se       $Y=aX+b$   
 $r=0.9998$   
 $Y=8.930E+000*X+7.507E-001$   
 $X=8.930E+000*Y-6.704E+000$   
 $DL=8.390E-01$  ppb  
 $BEC=6.704$  ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element  
(1) 88 Sr  
ISTD 72 Unit  
ppb

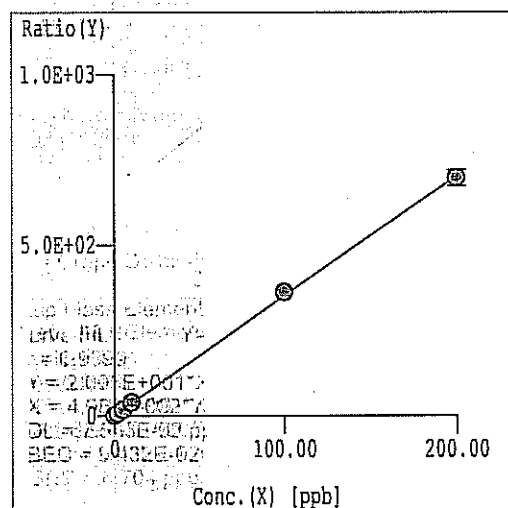


R/ct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	1.382E-01	1238	4.863E+00	P 10.84
2	2.000	2.010	1.144E+04	4.220E+01	P 1.897
3	5.000	5.247	2.948E+04	1.071E+02	P 5.037E-01
4	10.00	10.77	5.866E+04	2.179E+02	P 1.186
5	100.0	97.75	5.085E+05	1.962E+03	P 1.522
6	200.0	201.1	1.107E+06	4.034E+03	A 2.526
7	X 8.000E-01				
8					
9					
10					
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13					
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15					
16					
17					
18					
19					
20					

Step Mass Element  
(1) 88 Sr  
Curve Fit:  $Y = aX + b$   
 $r = 0.9999$   
 $Y = 2.005E+001 * X + 1.891E+000$   
 $X = 4.987E-002 * Y - 9.432E-002$   
 $DL = 7.563E-02$  ppb  
 $BEC = 9.432E-02$  ppb

Weight: OFF  
Min Conc: 0.000

Step Mass Element  
(1) 95 Mo  
ISTD 72 Unit  
ppb



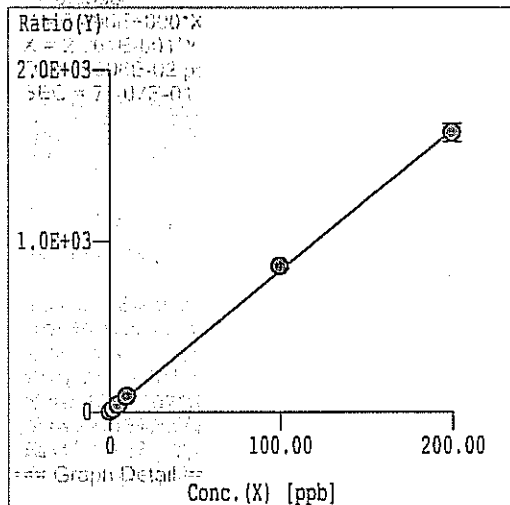
R/ct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1	0.000	-6.002E-01	130.0	4.908E-01	P 14.97
2	2.000	1.346	1976	7.292E+00	P 5.819
3	5.000	4.368	4914	1.785E+01	P 5.074
4	10.00	10.50	1.058E+04	3.930E+01	P 8.009E-01
5	100.0	102.8	9.376E+04	3.618E+02	P 1.406
6	200.0	198.6	1.913E+05	6.967E+02	P 3.337
7	X 8.000E-01				
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19					
20					

Step Mass Element  
(1) 95 Mo  
Curve Fit:  $Y = aX + b$   
 $r = 0.9998$   
 $Y = 3.495E+000 * X + 2.589E+000$   
 $X = 2.861E-001 * Y - 7.407E-001$   
 $DL = 6.306E-02$  ppb  
 $BEC = 7.407E-01$  ppb

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 109 Ag            72    ppb



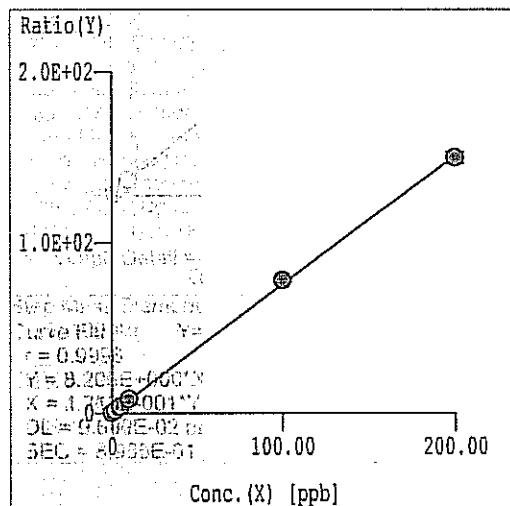
	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-7.691E-01	276.7	1.045E+00	P 25.36
2		2.000	1.221	4710	1.738E+01	P 2.664
3		5.000	4.498	1.218E+04	4.427E+01	P 2.580
4		10.00	10.42	2.500E+04	9.285E+01	P 1.418
5		100.0	103.3	2.215E+05	8.547E+02	P 1.912
6		200.0	198.4	4.488E+05	1.635E+03	P 3.275
7	X	8.000E-01				
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Step Mass Element  
Curve Fit: Ag     $Y = aX + b$   
 $r = 0.9998$   
 $Y = 8.205E+000 * X + 7.356E+000$   
 $X = 1.219E-001 * Y - 8.965E-001$   
 $DL = 9.692E-02$  ppb  
 $BEC = 8.965E-01$  ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
 25.36  
 2.664  
 2.580  
 1.418  
 1.912  
 3.275

Step Mass Element      ISTD    Unit  
(1) 111 Cd            115    ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-6.518E-01	50.00	7.906E-02	P 5.869
2		2.000	1.295	1003	1.544E+00	P 2.782
3		5.000	4.406	2585	3.883E+00	P 3.610
4		10.00	10.48	5555	8.455E+00	P 2.640
5		100.0	102.9	4.871E+04	7.799E+01	P 1.168
6		200.0	198.5	9.961E+04	1.499E+02	P 2.214
7	X	8.000E-01				
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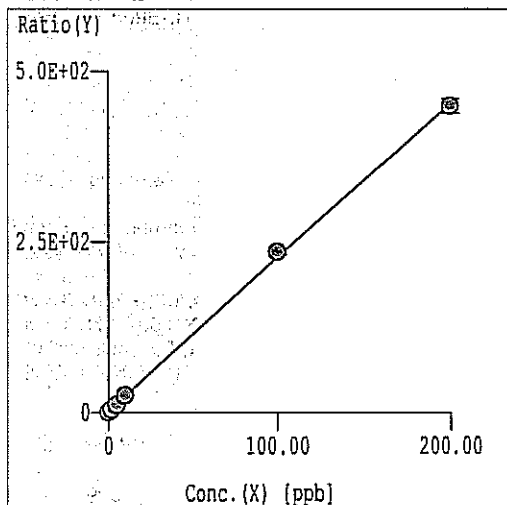
Curve Fit:  $Y = aX + b$   
 $r = 0.9998$   
 $Y = 7.521E-001 * X + 5.693E-001$   
 $X = 1.330E+000 * Y - 7.569E-001$   
 $DL = 1.851E-02$  ppb  
 $BEC = 7.569E-01$  ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
 5.869  
 2.782  
 3.610  
 2.640  
 1.168  
 2.214

## === Graph Detail ===

Step Mass Element  
(1) 118 Sn  
ISTD Unit  
115 ppb

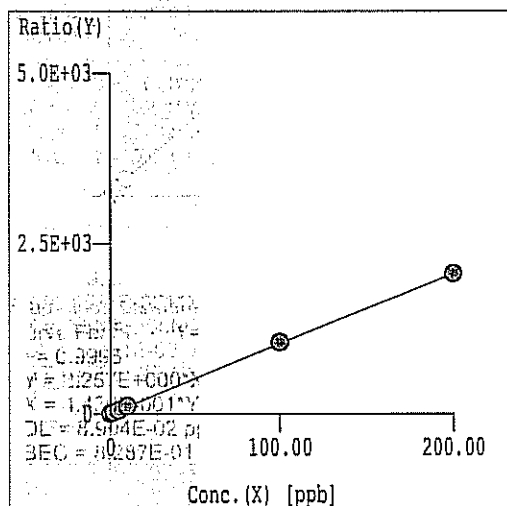


Curve Fit:  $Y=aX+b$   
 $r = 0.9998$   
 $Y = 2.257E+000 \cdot X + 1.871E+000$   
 $X = 4.430E-001 \cdot Y - 8.287E-001$   
 $DL = 8.994E-02$  ppb  
 $BEC = 8.287E-01$  ppb

	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-6.717E-01	223.3	3.546E-01	P 19.09
2		2.000	1.262	3063	4.719E+00	P 7.225
3		5.000	4.302	7710	1.158E+01	P 1.371
4		10.00	10.39	1.664E+04	2.532E+01	P 6.542E-01
5		100.0	103.4	1.470E+05	2.353E+02	P 1.913
6		200.0	198.3	2.987E+05	4.495E+02	P 2.368
7	X	8.000E-01				
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19						
20						

Weight: OFF  
Min Conc: 0.000

Step Mass Element  
(2) 121 Sb  
ISTD Unit  
72 ppb



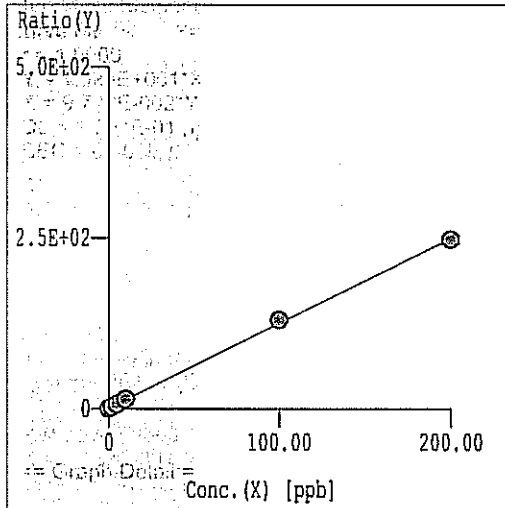
Curve Fit:  $Y=aX+b$   
 $r = 1.0000$   
 $Y = 1.028E+001 \cdot X + 6.581E+000$   
 $X = 9.729E-002 \cdot Y - 6.403E-001$   
 $DL = 1.397E-01$  ppb  
 $BEC = 6.403E-01$  ppb

	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-3.963E-01	218.9	2.508E+00	P 19.09
2		2.000	1.651	2044	2.355E+01	P 6.919
3		5.000	4.538	4671	5.323E+01	P 1.163
4		10.00	10.55	9896	1.150E+02	P 2.425
5		100.0	101.3	8.752E+04	1.048E+03	P 2.785
6		200.0	199.3	1.739E+05	2.055E+03	P 1.142
7	X	8.000E-01				
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19						
20						

Weight: OFF  
Min Conc: 0.000

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 137 Ba            115    ppb



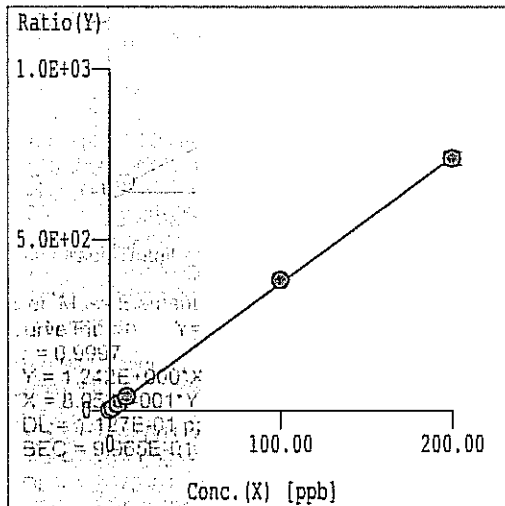
	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-7.581E-01	186.7	2.960E-01	P 15.77
2		2.000	1.156	1736	2.673E+00	P 6.269
3		5.000	4.376	4441	6.671E+00	P 2.753
4		10.00	10.48	9367	1.426E+01	P 1.532
5		100.0	103.5	8.102E+04	1.297E+02	P 2.193
6		200.0	198.3	1.644E+05	2.474E+02	P 2.469
7	X	8.000E-01				
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Step Mass Element  
Curve Fit Ba    Y=aX+b  
r = 0.9997  
Y = 1.242E+000\*X + 1.237E+000  
X = 8.053E-001\*Y - 9.965E-001  
DL = 1.127E-01 ppb  
BEC = 9.965E-01 ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
P 15.77  
P 6.269  
P 2.753  
P 1.532  
P 2.193  
P 2.469

Step Mass Element      ISTD    Unit  
(1) 203 Tl            209    ppb



	Rct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-4.427E-01	326.7	6.436E-01	P 18.25
2		2.000	1.363	3792	7.320E+00	P 3.831
3		5.000	4.543	1.009E+04	1.908E+01	P 6.745E-01
4		10.00	10.34	2.122E+04	4.054E+01	P 6.223E-01
5		100.0	102.4	1.882E+05	3.809E+02	P 5.932E-01
6		200.0	198.8	3.827E+05	7.375E+02	P 2.633
7	X	8.000E-01				
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20						

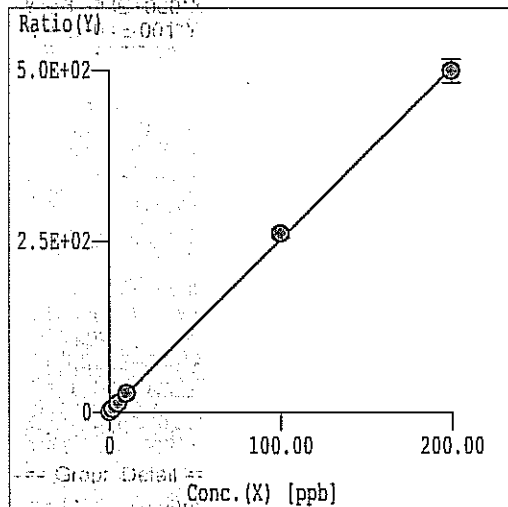
Step Mass Element  
Curve Fit Tl    Y=aX+b  
r = 0.9999  
Y = 3.698E+000\*X + 2.281E+000  
X = 2.704E-001\*Y - 6.167E-001  
DL = 9.527E-02 ppb  
BEC = 6.167E-01 ppb

Weight: OFF  
Min Conc: 0.000

RSD [%]  
P 18.25  
P 3.831  
P 6.745E-01  
P 6.223E-01  
P 5.932E-01  
P 2.633

## === Graph Detail ===

Step Mass Element      ISTD    Unit  
(1) 207 Pb            209    ppb



	Rjct	Conc	Calc Conc	CPS/Count	Ratio	RSD [%]
1		0.000	-6.920E-01	192.2	3.786E-01	P 6.687
2		2.000	1.267	2739	5.292E+00	P 6.090
3		5.000	4.531	7125	1.348E+01	P 5.070
4		10.00	10.19	1.448E+04	2.766E+01	P 3.336
5		100.0	103.4	1.291E+05	2.614E+02	P 2.374
6		200.0	198.3	2.591E+05	4.994E+02	P 3.426
7	X	8.000E-01				
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Curve Fit:  $Y = aX + b$   
 $r = 0.9998$   
 $Y = 2.508E+000 * X + 2.114E+000$   
 $X = 3.988E-001 * Y - 8.430E-001$   
 $DL = 3.029E-02 \text{ ppb}$   
 $BEC = 8.430E-01 \text{ ppb}$

Weight: OFF  
 Min Conc: 0.000

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: MERCURY 080220B

Continuing Calibration Source:

Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Mercury	5.0	5.40	108	5.0	5.38	107.6	5.30	106	AV

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

FORM II (Part 1) - IN

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc. Contract:  
Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.: SDG No.: 0802300  
Initial Calibration Source: Run: MERCURY 080220B  
Continuing Calibration Source: Start: 2/20/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Mercury	5.0	5.40	108	5.0	5.24	104.8	5.27	105.4	AV

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115



2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc. Contract:  
Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.: SDG No.: 0802300  
Initial Calibration Source: Run: MERCURY 080225A  
Continuing Calibration Source: Start: 2/25/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Mercury	5.0	4.94	98.8	5.0	4.83	96.6	4.88	97.6	AV

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

2A  
INITIAL AND CONTINUING CALIBRATION VERIFICATION

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB Case No. MALCOLM PIRNIE SAS No.:

SDG No.: 0802300

Initial Calibration Source:

Run: MERCURY 080225A

Continuing Calibration Source:

Start: 2/25/2008

Concentration Units: ug/L

Analyte	Initial Calibration			Continuing Calibration					M
	True	Found	%R(1)	True	Found	%R(1)	Found	%R(1)	
Mercury	5.0	4.94	98.8	5.0	4.87	97.4			AV

(1) Control Limits: Mercury 80-120; Other Metals 90-110; Cyanide 85-115

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): WATER

Run: MERCURY 080220B

Preparation Blank Concentration Units (ug/L or mg/kg): ug/L

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
	C		1	C	2	C	3	C	C		
Mercury	0.0		0.0		0.0		0.0		0.000		AV

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): WATER

Run: MERCURY 080220B

Preparation Blank Concentration Units (ug/L or mg/kg): ug/L

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Preparation Blank		M
	C		1	C	2	C	3	C	C		
Mercury	0.0		0.0						0.000		AV

Note: MDLs are used, not IDLs

FORM III - IN

3  
BLANKS

Lab Name: e-Lab Analytical, Inc.

Contract:

Lab Code: ELAB

Case No. MALCOLM PIRNIE

SAS No.:

SDG No.: 0802300

Preparation Blank Matrix (soil/water): SOIL

Run: MERCURY 080225A

Preparation Blank Concentration Units (ug/L or mg/kg): mg/Kg

Analyte	Initial Calib. Blank (ug/L)		Continuing Calibration Blank (ug/L)						Prepa- ration Blank		M
	C		1	C	2	C	3	C	C		
Mercury	0.0		-0.1		-0.1		-0.1		0.000		AV

Note: MDLs are used, not IDLs

FORM III - IN

# CETAC Hg Analysis Report

Analyst: instrument

Worksheet file: C:\Program Files\Quick Trace\Worksheets\022008BW.wsz

Date Started: 2/20/2008 1:28:36 PM

Comment:

ICA STD# 731-584.60-3  
MS/LCS STD# 731-584.60.4  
JC, 2/20/08

## Results

Sample Name	Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
Calibration Blank	STD	02/20/08 01:31:35 pm	0.000	66	3.76
Replicates				65.5 64.0 <del>64.8</del> 69.5	
Standard #1	STD	02/20/08 01:33:36 pm	0.200	586	0.58
Replicates				585.7 585.1 <del>583.6</del> 591.4	
Standard #2	STD	02/20/08 01:35:38 pm	1.000	2764	0.76
Replicates				2742.5 2754.1 <del>2769.9</del> 2790.8	
Standard #3	STD	02/20/08 01:37:39 pm	2.000	5528	0.68
Replicates				5485.1 5519.1 <del>5530.7</del> 5576.6	
Standard #4	STD	02/20/08 01:39:40 pm	5.000	13722	0.77
Replicates				13581.0 13702.2 <del>13784.6</del> 13819.5	
Standard #5	STD	02/20/08 01:41:44 pm	10.000	27292	0.71
Replicates				27014.8 27301.2 2741 9.0 27433.8	

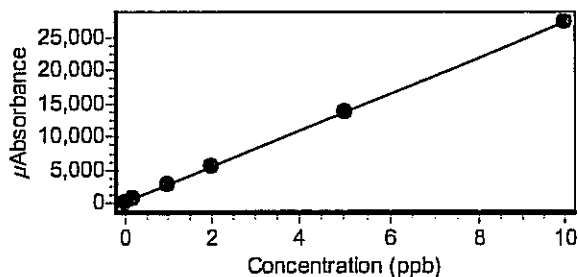
### Calibration

Equation:  $A = 60.338 + 2725.090C$

R2: 0.99999

SEE: 26.4498

Flags:



ICV-584-60-05	ICV	02/20/08 01:49:30 pm	5.400	14764	0.26
Replicates				14714.2 14759.3 14778.6 14804.0	
% Recovery				107.91	
ICB	ICB	02/20/08 01:51:30 pm	-0.003	52	15.48
Replicates				61.2 55.5 <del>48.3</del> 42.9	

Sample Name					Type	Date/Time	Conc (ppb)	μAbs	%RSD
CRA-584-60-03					CRDL	02/20/08 01:53:29 pm	0.185	565	1.59
Replicates	556.6	558.7	571.4	574.6					
% Recovery	92.65								
GBLKW1-022008					MB	02/20/08 01:55:28 pm	-0.010	33	8.95
Replicates	30.0	30.7	34.6	36.0					
GLCSW1-022008-584-60-04					LCS	02/20/08 01:57:27 pm	5.350	14651	0.33
Replicates	14580.8	14655.6	14683.6	14685.5					
% Recovery	107.09								
GLCSDW1-022008-584-60-04					LCS	02/20/08 01:59:29 pm	5.400	14776	0.64
Replicates	14640.5	14785.1	14854.2	14824.9					
% Recovery	108.00								
0802349-01D					UNK	02/20/08 02:01:29 pm	-0.009	37	24.55
Replicates	48.3	38.8	32.9	27.2					
0802349-01DDUP					DUP	02/20/08 02:03:30 pm	-0.013	25	7.83
Replicates	25.8	26.9	26.0	22.4					
		RPD 0.00							
0802349-01DMS-584-60-04					MSK	02/20/08 02:05:31 pm	5.420	14817	0.39
Replicates	14733.7	14834.1	14836.7	14865.0					
% Recovery	108.56								
0802349-01DMSD-584-60-04					MSDUP	02/20/08 02:07:32 pm	5.360	14678	0.12
Replicates	14674.2	14702.5	14671.6	14663.1					
% Recovery	107.54	RPD 0.95							
CCV-584-60-05					CCV	02/20/08 02:09:34 pm	5.380	14715	0.32
Replicates	14658.3	14705.6	14724.7	14773.3					
% Recovery	107.56								
CCB					CCB	02/20/08 02:11:37 pm	-0.007	40	29.79
Replicates	55.3	41.7	35.7	27.0					
0802289-01A					UNK	02/20/08 02:18:13 pm	2.590	7109	0.41
Replicates	7146.0	7112.6	7077.0	7099.0					
0802300-09B					UNK	02/20/08 02:20:13 pm	-0.015	19	15.08
Replicates	16.3	19.2	18.1	23.1					

Sample Name					Type	Date/Time	Conc (ppb)	μAbs	%RSD
0802300-10B					UNK	02/20/08 02:22:12 pm	-0.015	19	8.66
Replicates	18.6	20.4	16.9	20.3					
0802307-01E					UNK	02/20/08 02:24:12 pm	0.020	115	3.67
Replicates	110.1	115.0	116.6	120.3					
0802314-01B					UNK	02/20/08 02:26:12 pm	2.220	6104	1.21
Replicates	6044.5	6060.2	6103.9	6208.9					
0802314-02B					UNK	02/20/08 02:28:14 pm	15.200	41524	0.36
Replicates	41400.2	41416.8	41551.3	41726.1					
0802314-03B					UNK	02/20/08 02:30:20 pm	2.310	6368	0.54
Replicates	6364.3	6348.0	6342.6	6417.9					
0802314-04B					UNK	02/20/08 02:32:26 pm	-0.008	37	13.00
Replicates	43.6	31.7	36.8	37.5					
0802314-05B					UNK	02/20/08 02:34:29 pm	0.044	179	0.84
Replicates	180.5	180.4	179.1	177.2					
0802314-06B					UNK	02/20/08 02:36:30 pm	3.630	9966	0.59
Replicates	9887.3	9967.1	10031.1	9976.6					
CCV-584-60-05					CCV	02/20/08 02:38:36 pm	5.300	14498	0.30
Replicates	14443.5	14510.8	14489.5	14547.4					
% Recovery	105.96								
CCB					CCB	02/20/08 02:40:38 pm	-0.032	-26	11.07
Replicates	-26.3	-28.8	-26.7	-21.9					
0802315-01A					UNK	02/20/08 02:42:40 pm	0.043	177	4.38
Replicates	167.9	173.4	182.6	184.2					
0802315-02B					UNK	02/20/08 02:44:39 pm	0.049	193	1.42
Replicates	192.6	194.3	196.6	190.1					



Sample Name					Type	Date/Time	Conc (ppb)	μAbs	%RSD
0802315-03A					UNK	02/20/08 02:46:38 pm	0.061	227	2.11
Replicates	221.9	224.0	231.6	230.5					
0802315-04A					UNK	02/20/08 02:48:38 pm	0.046	187	3.08
Replicates	183.1	180.4	192.7	190.0					
0802356-01B					UNK	02/20/08 02:50:40 pm	0.690	1940	0.38
Replicates	1930.1	1940.9	1947.4	1943.6					
CCV-584-60-05					CCV	02/20/08 02:52:40 pm	5.240	14345	0.47
Replicates	14253.8	14349.3	14414.1	14362.2					
% Recovery	104.84								
CCB					CCB	02/20/08 02:54:43 pm	-0.022	1519.01	
Replicates	9.4	5.6	-6.5	-2.9					
0802314-02BX5					UNK	02/20/08 03:02:30 pm	3.440	9429	0.05
Replicates	9433.3	9429.4	9422.2	9431.9					
0802289-01A					UNK	02/20/08 03:04:32 pm	2.380	6545	1.29
Replicates	6431.2	6533.4	6590.3	6623.7					
0802314-01B					UNK	02/20/08 03:06:34 pm	2.120	5845	0.94
Replicates	5783.7	5820.3	5865.4	5909.8					
0802314-03B					UNK	02/20/08 03:08:38 pm	2.280	6284	0.58
Replicates	6260.5	6256.5	6283.8	6335.3					
0802314-06B					UNK	02/20/08 03:10:40 pm	3.480	9544	0.65
Replicates	9453.6	9571.5	9592.0	9557.2					
0802356-01B					UNK	02/20/08 03:12:40 pm	0.661	1861	0.29
Replicates	1853.8	1866.0	1860.6	1864.6					
CCV-584-60-05					CCV	02/20/08 03:14:42 pm	5.270	14415	0.75
Replicates	14331.9	14335.8	14432.0	14560.4					
% Recovery	105.35								

Sample Name					Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
CCB					CCB	02/20/08 03:16:44 pm	-0.019	10	89.10
Replicates	8.2	17.0	15.0	-1.9					
GBLKW2-022008					MB	02/20/08 03:18:46 pm	-0.005	47	9.13
Replicates	44.9	52.7	48.8	43.0					
GLCSW2-022008-584-60-04					LCS	02/20/08 03:20:47 pm	5.440	14883	0.52
Replicates	14780.8	14867.4	14921.0	14961.2					
% Recovery	108.78								
GLCSDW2-022008-584-60-04					LCS	02/20/08 03:22:50 pm	5.460	14950	1.15
Replicates	14746.8	14882.7	15031.8	15140.7					
% Recovery	109.28								
0802221-01A					UNK	02/20/08 03:24:51 pm	0.013	95	11.04
Replicates	99.2	106.8	90.6	82.6					
0802221-01ADUP					DUP	02/20/08 03:26:53 pm	0.001	64	6.35
Replicates	63.6	66.9	66.2	58.0					
	RPD 0.00								
0802221-01AMS-584-60-04					MSK	02/20/08 03:28:55 pm	5.530	15126	0.34
Replicates	15052.0	15133.8	15149.1	15167.4					
% Recovery	110.54								
0802221-01AMSD-584-60-04					MSDUP	02/20/08 03:31:00 pm	5.440	14886	0.23
Replicates	14838.6	14917.4	14897.6	14891.9					
% Recovery	108.79	RPD 1.60							
0802221-02A					UNK	02/20/08 03:33:02 pm	0.001	63	4.91
Replicates	65.2	61.3	59.1	65.5					
0802218-01B					UNK	02/20/08 03:35:06 pm	20.400	55704	0.00
Replicates	55703.9	55703.9	55703.9	55703.9					
CCV-584-60-05					CCV	02/20/08 03:38:29 pm	5.070	13875	0.31
Replicates	13849.4	13859.5	13851.0	13940.2					
% Recovery	101.39								
CCB					CCB	02/20/08 03:40:29 pm	-0.017	14	17.67
Replicates	13.9	13.0	12.5	18.1					

Sample Name	Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
0802218-01BX10	UNK	02/20/08 03:44:27 pm	4.770	13069	0.57
Replicates	12995.2	13028.8	13086.8	13165.3	
CCV-584-60-05	CCV	02/20/08 03:48:20 pm	5.130	14046	0.46
Replicates	13969.9	14020.2	14073.1	14120.4	
% Recovery	102.64				
CCB	CCB	02/20/08 03:50:22 pm	-0.013	25	20.72
Replicates	29.2	26.0	26.3	17.3	
GBLKW3-022008	MB	02/20/08 04:01:02 pm	-0.008	39	4.31
Replicates	37.3	40.6	39.7	37.4	
GLCSW3-022008-584-60-04	LCS	02/20/08 04:03:04 pm	5.440	14883	0.38
Replicates	14823.4	14855.6	14896.4	14956.1	
% Recovery	108.79				
GLCSDW3-022008-594-60-04	LCS	02/20/08 04:05:07 pm	5.430	14855	0.40
Replicates	14834.2	14812.9	14830.4	14941.8	
% Recovery	108.58				
GBLKT1-021808	UNK	02/20/08 04:07:09 pm	-0.008	38	24.87
Replicates	51.4	36.8	32.1	31.0	
0802317-02A	UNK	02/20/08 04:09:11 pm	-0.014	22	27.02
Replicates	26.0	19.0	15.1	27.7	
0802317-02ADUP	DUP	02/20/08 04:11:15 pm	-0.011	31	6.21
Replicates	29.2	30.5	32.2	33.7	
	RPD 0.00				
0802317-02AMS-584-60-04	MSK	02/20/08 04:13:18 pm	5.480	14997	0.55
Replicates	14891.6	15053.0	15073.1	14971.7	
% Recovery	109.84				
0802317-02AMSD-584-60-04	MSDUP	02/20/08 04:15:18 pm	5.600	15308	0.65
Replicates	15171.5	15298.4	15365.1	15396.7	
% Recovery	112.12	RPD 2.06			
0802317-01A	UNK	02/20/08 04:17:20 pm	-0.024	-4	296.02
Replicates	6.6	4.8	-13.8	-12.3	

Sample Name				Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
0802317-03A				UNK	02/20/08 04:19:24 pm	0.001	63	10.77
Replicates	61.9	67.8	67.5	53.4				
CCV-584-60-05				CCV	02/20/08 04:21:25 pm	5.310	14537	0.90
Replicates	14377.2	14495.7	14593.4	14681.1				
% Recovery	106.25							
CCB				CCB	02/20/08 04:23:29 pm	-0.018	10	24.47
Replicates	14.0	10.5	9.3	8.0				
0802245-01B				UNK	02/20/08 04:25:32 pm	-0.009	35	10.69
Replicates	37.1	39.6	32.0	32.2				
0802248-01A				UNK	02/20/08 04:27:34 pm	-0.001	58	9.00
Replicates	62.1	53.6	62.1	52.7				
0802302-01A				UNK	02/20/08 04:29:36 pm	-0.011	29	19.30
Replicates	33.2	23.2	35.0	25.9				
0802316-01A				UNK	02/20/08 04:31:39 pm	0.001	63	13.23
Replicates	52.4	65.5	60.6	72.1				
CCV-584-60-05				CCV	02/20/08 04:33:46 pm	5.280	14436	0.31
Replicates	14404.1	14402.1	14441.3	14496.9				
% Recovery	105.51							
CCB				CCB	02/20/08 04:35:50 pm	-0.028	-16	25.72
Replicates	-12.6	-18.4	-13.1	-21.3				

# CETAC Hg Analysis Report

Analyst: instrument

Worksheet file: C:\Program Files\QuickTrace\Worksheets\022508AS.wsz

Date Started: 2/25/2008 12:52:07 PM

Comment:

ICV STD# 731-584.60.11  
MS/LCS STD# 731-584.60.12  
JC. 2/25/08

## Results

Sample Name	Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
Calibration Blank	STD	02/25/08 02:37:19 pm	0.000	61	7.70
Replicates			66.2 62.5 57.4 56.1		
Standard #1	STD	02/25/08 02:39:18 pm	0.200	819	1.10
Replicates			805.8 820.1 823.0 826.2		
Standard #2	STD	02/25/08 02:41:18 pm	1.000	3799	0.69
Replicates			3774.5 3782.8 3805.1 3832.9		
Standard #3	STD	02/25/08 02:43:18 pm	2.000	7621	0.99
Replicates			7537.2 7584.9 7654.9 7708.9		
Standard #4	STD	02/25/08 02:45:20 pm	5.000	18731	0.42
Replicates			18635.1 18707.5 18762.4 18818.2		
Standard #5	STD	02/25/08 02:47:24 pm	10.000	36046	0.66
Replicates			35809.0 35910.0 36119.6 36345.4		

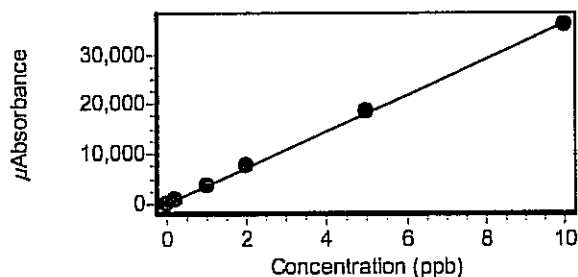
### Calibration

Equation:  $A = 240.998 + 3606.070C$

R2: 0.99963

SEE: 300.1214

Flags:



ICV-584-60-13	ICV	02/25/08 02:52:23 pm	4.940	18040	0.32
Replicates			17956.2 18048.9 18064.2 18090.4		
% Recovery			98.72		
ICB	ICB	02/25/08 02:54:25 pm	-0.048	69	23.75
Replicates			87.3 73.7 65.2 48.4		

Sample Name					Type	Date/Time	Conc (ppb)	μAbs	%RSD
CRA-584-60-11					CRDL	02/25/08 02:56:26 pm	0.158	810	0.77
Replicates	801.6	810.8	816.6	811.5					
% Recovery	78.91								
GBLKS1-022508					MB	02/25/08 02:58:24 pm	-0.041	92	4.42
Replicates	96.8	90.8	92.0	87.0					
GLCSS1-022508-584-60-12					LCS	02/25/08 03:00:26 pm	5.210	19047	0.55
Replicates	18914.4	19015.4	19099.5	19156.9					
% Recovery	104.30								
GLCSDS1-022508-584-60-12					LCS	02/25/08 03:02:28 pm	5.170	18879	0.56
Replicates	18737.8	18857.1	18951.0	18968.4					
% Recovery	103.37								
0802300-01C					UNK	02/25/08 03:12:09 pm	0.142	752	0.40
Replicates	748.3	753.5	752.2	755.5					
0802300-01CDUP					DUP	02/25/08 03:14:09 pm	0.143	756	0.80
Replicates	748.1	761.4	760.5	755.7					
	RPD 0.00								
0802300-01CMS-584-60-12					MSK	02/25/08 03:16:10 pm	4.990	18223	0.62
Replicates	18072.7	18201.7	18308.4	18309.3					
% Recovery	96.87								
0802300-01CMSD-584-60-12					MSDUP	02/25/08 03:18:14 pm	5.060	18479	0.25
Replicates	18410.6	18487.0	18506.7	18511.2					
% Recovery	98.29	RPD 1.41							
CCV-584-60-13					CCV	02/25/08 03:20:16 pm	4.830	17656	1.05
Replicates	17451.8	17562.3	17744.5	17866.4					
% Recovery	96.59								
CCB					CCB	02/25/08 03:22:19 pm	-0.058	32	16.32
Replicates	39.6	31.5	29.9	27.5					
0802300-02D					UNK	02/25/08 03:29:21 pm	-0.022	161	1.78
Replicates	159.2	157.5	163.9	162.1					
0802300-03C					UNK	02/25/08 03:31:21 pm	-0.035	115	2.04
Replicates	112.1	116.4	116.1	117.4					

Sample Name					Type	Date/Time	Conc (ppb)	μAbs	%RSD
0802300-04C					UNK	02/25/08 03:33:20 pm	0.080	529	0.45
Replicates	528.2	526.1	529.8	531.7					
0802300-05D					UNK	02/25/08 03:35:20 pm	-0.039	99	2.25
Replicates	97.6	97.9	98.3	102.3					
0802300-06C					UNK	02/25/08 03:37:21 pm	-0.034	118	3.59
Replicates	111.9	121.6	117.9	120.1					
0802300-07D					UNK	02/25/08 03:39:21 pm	-0.025	150	2.97
Replicates	143.9	151.7	154.3	151.6					
0802300-08D					UNK	02/25/08 03:41:23 pm	-0.025	150	3.00
Replicates	144.9	147.9	152.4	155.0					
0802304-01D					UNK	02/25/08 03:43:24 pm	-0.015	188	3.14
Replicates	183.7	191.1	195.1	182.8					
0802304-02D					UNK	02/25/08 03:45:26 pm	0.003	253	1.51
Replicates	247.5	253.8	256.7	252.6					
0802304-03D					UNK	02/25/08 03:47:29 pm	0.014	291	2.49
Replicates	280.1	295.5	292.3	295.1					
CCV-584-60-13					CCV	02/25/08 03:49:31 pm	4.880	17850	0.76
Replicates	17656.9	17852.2	17935.0	17956.0					
% Recovery	97.66								
CCB					CCB	02/25/08 03:53:52 pm	-0.058	33	18.54
Replicates	38.6	27.7	27.3	37.3					
0802318-01C					UNK	02/25/08 03:55:51 pm	0.151	785	0.46
Replicates	781.0	782.9	786.5	789.2					
0802318-02D					UNK	02/25/08 03:57:50 pm	-0.032	124	3.00
Replicates	129.5	123.0	121.5	122.0					

Sample Name					Type	Date/Time	Conc (ppb)	μAbs	%RSD
0802318-03C					UNK	02/25/08 03:59:51 pm	-0.002	232	1.29
Replicates	234.2	234.8	231.5	228.2					
0802318-04C					UNK	02/25/08 04:01:50 pm	-0.015	188	2.01
Replicates	189.0	191.5	183.0	190.4					
CCV-584-60-13					CCV	02/25/08 04:03:52 pm	4.870	17809	0.60
Replicates	17702.2	17753.5	17833.8	17948.2					
% Recovery	97.44								
CCB					CCB	02/25/08 04:05:56 pm	-0.060	23	26.59
Replicates	31.5	20.0	17.7	21.9					
GBLKS2-022508					MB	02/25/08 04:13:57 pm	-0.052	55	10.57
Replicates	48.3	52.7	54.8	62.1					
GLCSS2-022508-584-60-12					LCS	02/25/08 04:15:58 pm	5.120	18707	0.58
Replicates	18550.5	18719.3	18791.5	18768.6					
% Recovery	102.42								
GLCSDS2-022508-584-60-12					LCS	02/25/08 04:18:04 pm	5.240	19127	0.25
Replicates	19063.9	19124.4	19144.6	19176.9					
% Recovery	104.75								
0802326-06C					UNK	02/25/08 04:20:07 pm	-0.047	73	7.40
Replicates	77.3	74.0	75.7	65.2					
0802326-06CDUP					DUP	02/25/08 04:22:11 pm	-0.049	66	5.61
Replicates	67.9	64.9	69.1	60.8					
	RPD 0.00								
0802326-06CMS-584-60-12					MSK	02/25/08 04:24:13 pm	4.690	17147	0.17
Replicates	17104.8	17163.7	17165.8	17154.7					
% Recovery	94.74								
0802326-06CMSD-584-60-12					MSDUP	02/25/08 04:26:15 pm	4.800	17548	0.48
Replicates	17440.4	17529.4	17587.3	17636.7					
% Recovery	96.96	RPD 2.35							
0802326-01B					UNK	02/25/08 04:28:17 pm	0.118	667	0.45
Replicates	667.8	663.1	669.6	669.3					



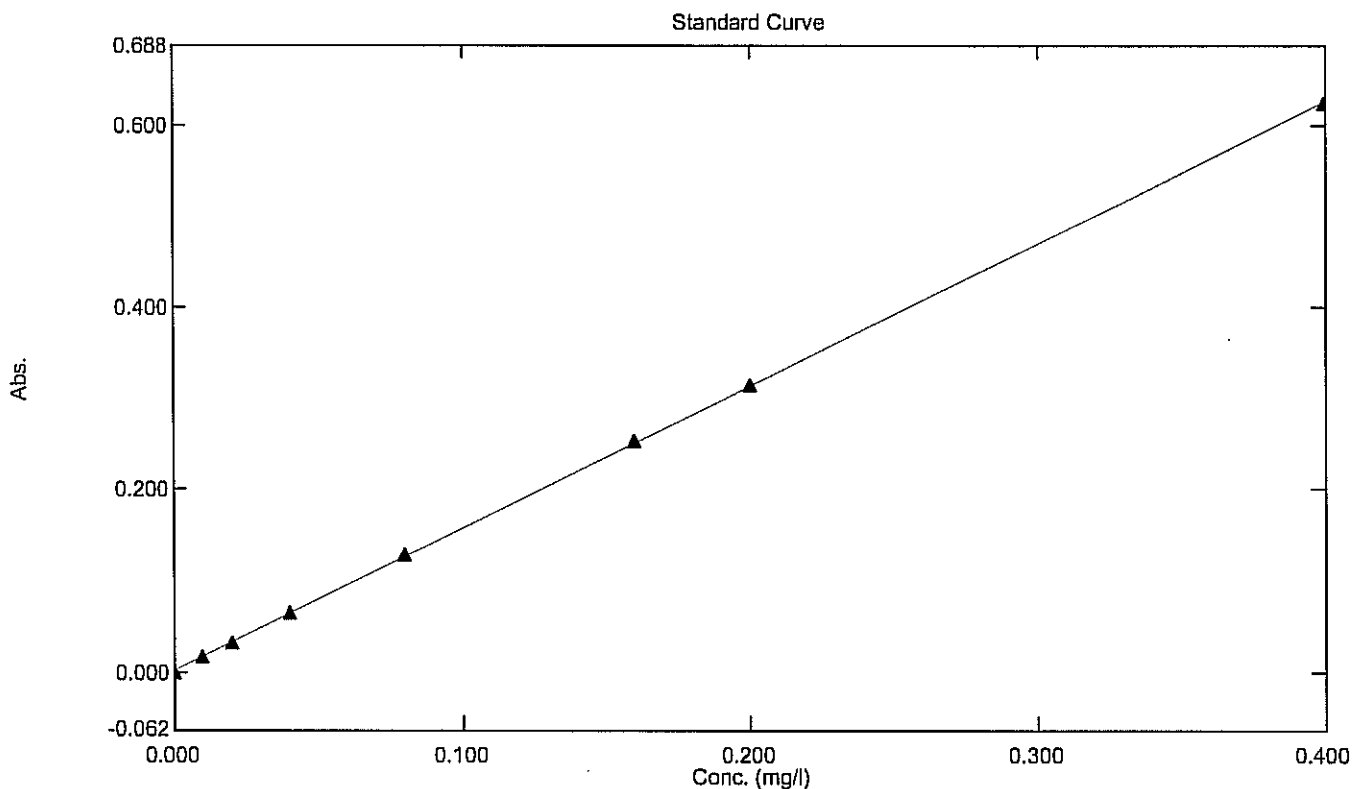
Sample Name				Type	Date/Time	Conc (ppb)	$\mu$ Abs	%RSD
0802326-02B				UNK	02/25/08 04:30:19 pm	-0.015	187	2.57
Replicates	183.3	185.8	184.5	193.9				
0802326-03C				UNK	02/25/08 04:32:19 pm	-0.034	119	0.96
Replicates	117.7	118.7	119.7	120.2				
CCV-584-60-13				CCV	02/25/08 04:34:20 pm	4.910	17960	0.73
Replicates	17807.5	17901.0	18030.0	18101.9				
% Recovery	98.27							
CCB				CCB	02/25/08 04:36:25 pm	-0.056	39	12.33
Replicates	43.6	35.4	34.3	42.7				
0802326-04C				UNK	02/25/08 04:38:27 pm	0.011	281	2.11
Replicates	282.9	288.1	275.8	276.1				
0802326-05C				UNK	02/25/08 04:40:30 pm	0.054	436	0.88
Replicates	434.1	436.1	432.7	441.4				
0802326-07C				UNK	02/25/08 04:42:32 pm	0.033	360	0.81
Replicates	360.8	362.9	358.3	356.2				
0802326-08B				UNK	02/25/08 04:44:34 pm	0.030	348	0.67
Replicates	346.2	351.4	346.7	348.4				
0802326-09B				UNK	02/25/08 04:46:37 pm	-0.035	117	1.96
Replicates	118.4	115.3	118.5	113.9				
0802326-10C				UNK	02/25/08 04:48:41 pm	-0.036	110	3.47
Replicates	112.3	112.4	110.3	104.3				
CCV-584-60-13				CCV	02/25/08 04:50:42 pm	4.960	18111	0.23
Replicates	18050.6	18134.2	18139.1	18118.3				
% Recovery	99.11							
CCB				CCB	02/25/08 04:52:46 pm	-0.065	6	43.53
Replicates	5.1	8.1	7.0	2.5				

# Standard Table Report

02/28/2008 04:03:20 PM

File Name: C:\Program

Files\Shimadzu\UVProbe\Data\CALIBRATION\Cyanide\120707\_CN\_TW\_TS\_CAL.p



Standard Table

	Sample ID	Type	Ex	Conc	WL578.0	Wgt.Factor	Comments
1	STD1	Standard		0.000	0.000	1.000	
2	STD2	Standard		0.010	0.016	1.000	
3	STD3	Standard		0.020	0.032	1.000	
4	STD4	Standard		0.040	0.065	1.000	
5	STD5	Standard		0.080	0.128	1.000	
6	STD6	Standard		0.160	0.253	1.000	
7	STD7	Standard		0.200	0.316	1.000	
8	STD8	Standard		0.400	0.625	1.000	
9							

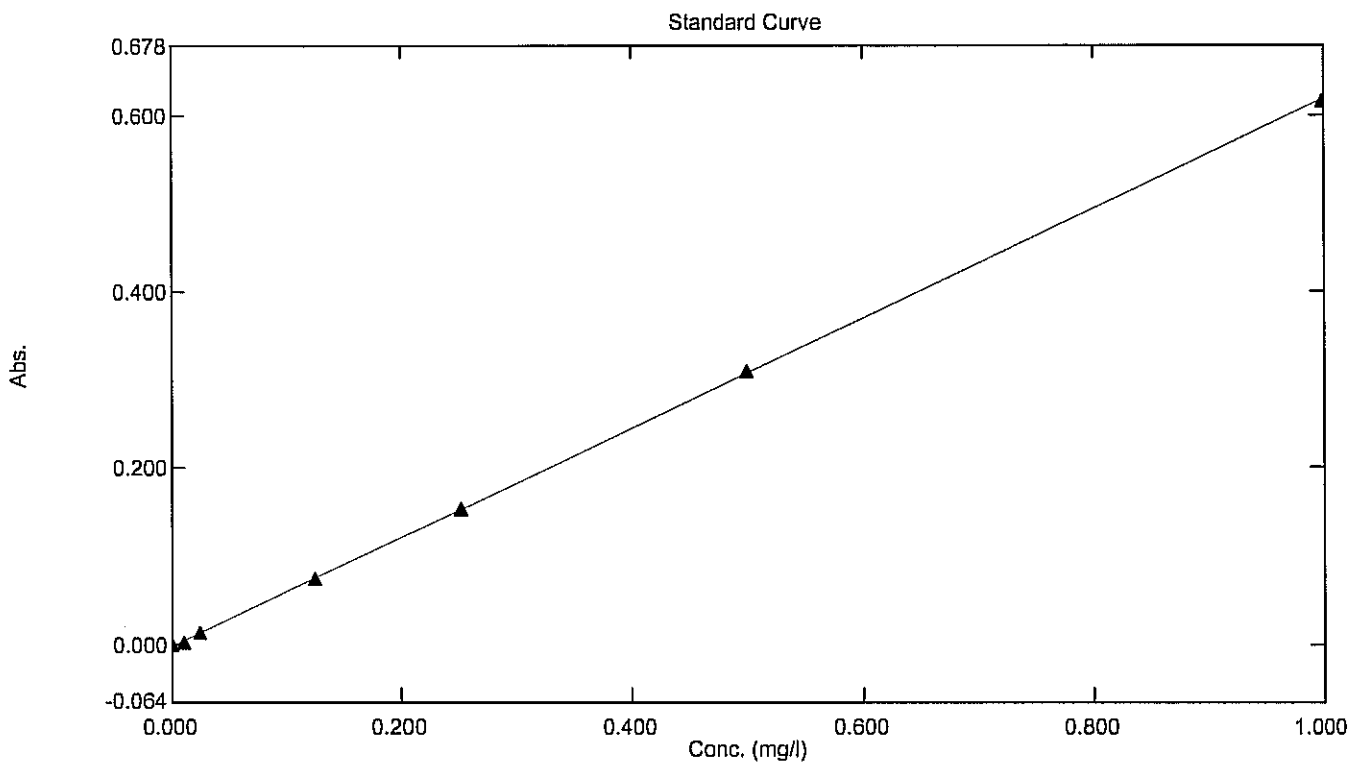
Total Cyanide by SW 9014 Prep by SW9010			SOPs: WC-020		578 nm	Analyst: KPM	Date/Time: 02-22-08 1200	
Water or Soil WO # / SX #	Init Sx Wt or Vol (g / mL)	Final Prep Vol. (mL)	Prep Dil factor	Final Dil factor	Abs.	Init Conc mg/L.	Final Conc. mg/L / mg/Kg	Comments
WBLKSI	1g	50	50X		0.001	-0.00	-0.000	PGC205
WLRSSI					0.305	0.194	9.7	
0802304-01					0.005	0.002	0.00	
DWP -01					0.005	0.002	0.00	
MS -01					0.289	0.184	9.2	
↓ -02					0.005	0.002	0.00	
↓ -03					0.004	0.002	0.00	
0802318-01					0.003	0.001	0.00	
↓ -02					0.002	0.00	0.00	
↓ -03					0.005	0.002	0.00	
↓ -04					0.005	0.002	0.00	
0802380-01					0.001	-0.00	0.00	
-02					0.004	0.001	0.00	
-03					0.005	0.002	0.00	
-04					0.006	0.002	0.00	
-05					0.003	0.001	0.00	
-06					0.006	0.003	0.00	
-07					0.006	0.002	0.00	
-08					0.006	0.002	0.00	
CCV	50				0.321		0.204	
CCS	↓				-0.000		-0.002	
LCS / ICV ID #: 573-80-1	CN Color reagent ID: 573-98-4		MgCl <sub>2</sub> (2.5M) ID: 573-27-01		Reviewed By: 2/25/08			
CCV ID 573-80-7	Chloramine-T ID: 1-746-9-04		NaHPO <sub>4</sub> · H <sub>2</sub> O ID: 51-746-2					

# Standard Table Report

02/28/2008 09:03:40 AM

File Name: C:\Program

Files\Shimadzu\UVProbe\Data\CALIBRATION\PO4\TP-OPO4-CAL-052207.pho



Multiple Correlation Coefficient  $r^2 = 0.99995$

Standard Table

	Sample ID	Type	Ex	Conc	WL880.0	Wgt.Factor	Comments
1	STD1	Standard		0.000	-0.001	1.000	
2	STD2	Standard		0.010	0.002	1.000	
3	STD3	Standard		0.025	0.013	1.000	
4	STD4	Standard		0.125	0.074	1.000	
5	STD5	Standard		0.250	0.154	1.000	
6	STD6	Standard		0.500	0.309	1.000	
7	STD7	Standard		1.000	0.616	1.000	
8							

Phosphorus Analysis

ALS Laboratory Group

Analyst: J. M.

Method: P-TS		SOP #:		Date/Time: 02/20/08 10:00		Color Sample (B)		Corrected Conc. - mg/L (B-A)		Comments / Batch ID	
WO # / SX #	Init Sample Vol (mL) or Wt (grams)	Prep Final Volume (mL)	Anal Dil Factor	Total Dil Factor	Background (A) Abs.	Conc. mg/L	Abs	Conc. mg/L	Corr. Abs (B-A)		
Lab 601	1 gr	50 ml		50X			0.000	0.003			P-60110
Lab 601				50X			0.159	0.260			
0802300-010			5X	250X			0.217	0.355			
0802300-010			5X	250X			0.213	0.347			
0802300-010			5X	250X			0.281	0.458			
0802300-020				50X			0.212	0.345			
0802300-030			5X	250X			0.122	0.200			
0802300-040			5X	250X			0.314	0.511			
0802300-050				50X			0.239	0.389			
0802300-060				50X			0.508	0.824			
0802300-070				50X			0.144	0.236			
0802300-080			5X	250X			0.390	0.634			
0802300-090			5X	250X			0.151	0.248			
0802300-100			5X	250X			0.238	0.388			
0802300-110				50X			0.335	0.544			
0802300-120							0.001	0.006			
0802300-130			5X	250X			0.156	0.256			
0802300-140			5X	250X			0.238	0.387			
0802300-150				50X			0.173	0.283			
0802300-160				50X			0.462	0.750			
0802300-170				50X			0.209	0.342			
Reagent ID: 1-116-10-06											Reviewed By: J. M.
Prep Date: 02/20/08											02-21-08
Reagent ID: 1-116-10-07											
Prep Date: 02/20/08											

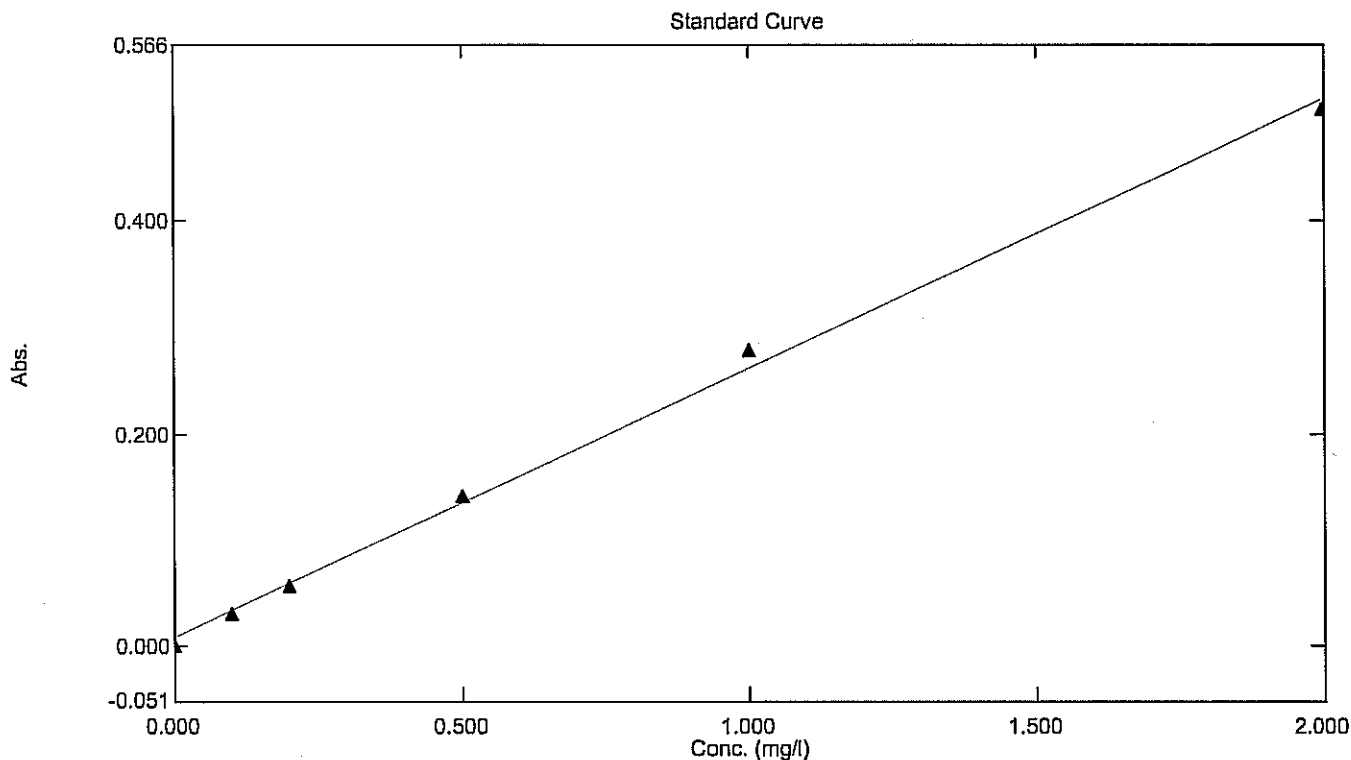
[illegible]

# Standard Table Report

02/29/2008 11:58:06 AM

File Name: C:\Program

Files\Shimadzu\UVProbe\Data\CALIBRATION\SIO2\022608-SiO2-cal.pho



Multiple Correlation Coefficient  $r^2 = 0.99735$

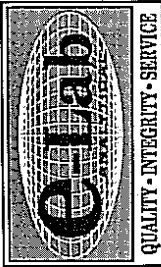
Standard Table

	Sample ID	Type	Ex	Conc	WL815.0	Wgt.Factor	Comments
1	std1	Standard		0.000	0.000	1.000	
2	std2	Standard		0.100	0.029	1.000	
3	std3	Standard		0.200	0.056	1.000	
4	std4	Standard		0.500	0.141	1.000	
5	std5	Standard		1.000	0.278	1.000	
6	std6	Standard		2.000	0.506	1.000	
7							

WO # / SX #		SOP #:		WC-00		Date/Time: 2/26/08 11:45		Analyst: ZF	
WO # / SX #	Init Sample Vol (mL) or Wt (grams)	Prep Final Volume (mL)	Anal Dil Factor	Total Dil Factor	Abs.	Init Conc. (mg/L)	Final Conc. (mg/L)	Comments / Batch ID	
1201K51-022608	20g	200 mL	N/A	10	-0.000	-0.030	0.00	R60293	
605 ↓					0.138	0.514	5.14		
0802300-01C					0.422	1.631	16.31		
1 Dup ↓					0.413	1.598	15.98	*MS failed due to matrix.	
MS ↓					0.522	2.028	20.28		
-02D					0.227	0.865	8.65		
-03C					0.362	1.398	13.98		
-04C					0.476	1.846	18.46		
-05D				✓	0.320	1.232	12.32		
-06C			2	20	0.369	1.425	20.5 <del>20.85</del> <sup>2/26/08</sup>	20.85 <sup>5</sup> 2/26/08	
-07D			2	20	0.263	1.006	20.12		
✓ -08D			N/A	10	0.310	1.193	11.93		
0802304-01D			5	50	0.393	1.519	75.95		
↓ -02D				10	0.673	1.834	18.34		
↓ -03D			2	20	0.462	1.790	35.8		
0802318-01C			2	20	0.429	1.659	33.18		
↓ -02D			2	20	0.266	1.017	20.34		
↓ -03C			5	50	0.486	1.883	94.15		
↓ -04C		✓	10	100	0.505	1.961	196.1		
CEV	50	50	N/A	N/A	0.142		0.529		
CEB	↓	↓	1-746	↓	-0.000		-0.032		
LCS / ICV ID #: 1-746-14-03		Reagent ID: 1-746-14-01			Reagent ID: 1-746-13-09			Reviewed By: <i>PF</i>	
LCS Prep Date: 2/25/08		Prep Date: 2/23/08			Prep Date: 2/23/08				
CCV ID #: 1-746-14-02		Reagent ID: 1-746-14-07			Reagent ID: 1-746-13-3				
CCV Prep Date: 2/25/08		Prep Date: 2/26/08			Prep Date: 2/22/08				



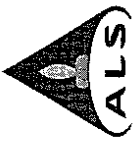
Analyst: TL		Date/Time In: 2/19/2008 12:00pm		Temp In Deg C:		105		
Review By: RPM		Date/Time Out: 2/20/2008 11:00am		Temp Out Deg C:		105		
Method: % Moisture		Batch ID: R60093						
SOP: WC-014 Rev 4								
WO #	Sample Type	Dish	Pan Wt	Wet Wt	1st Wt	2nd Wt	% Moisture	Analyte
0802346-04A	SAMP	1	1.2835	7.0349	5.674	5.676	37.56	Percent Moisture
0802346-04ADUP	DUP	2	1.2881	8.3122	6.5043	6.5072	37.21	Percent Moisture
0802334-01A	SAMP	3	1.2909	7.4107	7.0853	7.083	21.84	Percent Moisture
0802334-02A	SAMP	4	1.2802	5.8542	6.1711	6.1754	16.38	Percent Moisture
0802300-01C	SAMP	5	1.2875	6.0236	7.1688	7.1702	2.34	Percent Moisture
0802300-02C	SAMP	6	1.2984	7.5092	8.6177	8.6201	2.50	Percent Moisture
0802300-03C	SAMP	7	1.2821	7.9869	8.5706	8.5742	8.70	Percent Moisture
0802300-04C	SAMP	8	1.2893	8.7103	8.4197	8.4209	18.12	Percent Moisture
0802300-05C	SAMP	9	1.2932	9.4524	10.5599	10.5609	1.95	Percent Moisture
0802300-06C	SAMP	10	1.2847	7.8588	7.9831	7.9868	14.72	Percent Moisture
0802300-07D	SAMP	11	1.2876	8.2158	9.2586	9.2616	2.94	Percent Moisture
0802300-08C	SAMP	12	1.2844	6.0245	6.8819	6.8848	7.04	Percent Moisture
0802304-01D	SAMP	13	1.2905	8.8326	10.0111	10.0144	1.23	Percent Moisture
0802304-02D	SAMP	14	1.2873	8.2096	9.3381	9.3408	1.90	Percent Moisture
0802304-03D	SAMP	15	1.2922	8.0357	9.2209	9.2241	1.29	Percent Moisture
0802318-01C	SAMP	16	1.2954	6.9431	8.0428	8.0447	2.79	Percent Moisture
0802318-02C	SAMP	17	1.2937	7.1616	7.0237	7.0253	19.97	Percent Moisture
0802318-03C	SAMP	18	1.2879	6.7486	7.6419	7.6441	5.61	Percent Moisture
0802318-04C	SAMP	19	1.2952	6.9371	7.6494	7.6508	8.38	Percent Moisture
0802318-04CDUP	DUP	20	1.2947	6.9404	7.6683	7.6711	8.13	Percent Moisture
	SAMP	21					#DIV/0!	Percent Moisture
	DUP	22					#DIV/0!	Percent Moisture
							#DIV/0!	Percent Moisture
							#DIV/0!	Percent Moisture



e-Lab Analytical, Inc.  
10450 Stancil Rd. #210  
Houston, Texas 77099  
(Tel) 281.530.5656  
(Fax) 281.530.5887

# Chain of Custody Form

e-Lab Analytical, Inc.  
3352 128th Avenue  
Holland, Michigan 49424  
(Tel) 616.399.6070  
(Fax) 616.399.6185



Page 1 of 1

Customer Information				Project Information				Project Manager:				Work Order #			
Customer Information				Project Information				Project Manager:				Work Order #			
Purchase Order				Project Name				Oro Grande LF-Shallow Borings				Parameter/Method Request for Analysis			
Work Order				Project Number				5285-027				VOC (5035/8260) Select <u>511 134</u>			
Company Name				Bill To Company				Malcolm Pirnie, Inc.				DRO			
Send Report To				Invoice Attn				Michael Fortenza				SVOC (8270) Select			
Address				Address				1700 West Loop South				Total Metals (6020/7000) Select			
Suite				Suite				Suite 1450				Pesticides, Chlorinated (8081)			
City/State/Zip				City/State/Zip				Houston, TX 77027				PCBs (8082)			
Phone				Phone				(713) 840-1511				Herbicides (8151)			
Fax				Fax				(713) 840-1207				Total Cyanide (9012)			
e-Mail/Address				e-Mail/Address				(713) 840-1207				Phosphorus			
Moisture															
No.				Sample Description				Date				Time			
1				SB F14-SB-1 (0-2)				2/13/08				4:35			
2				F14-SB-1 (13-15)								4:45			
3				F14-SB-1 (28-30)								5:15			
4				F14-SB-4 (0-2)								3:28			
5				F14-SB-4 (13-15)								3:37			
6				F14-SB-4 (28-30)								3:55			
7				Dup-2											
8				Dup-3											
9															
10															
Sampler(s) Please Print & Sign				Shipment Method				Required Turnaround Time: (Check Box)				Results Due Date:			
Relinquished by: <u>Col-Nugent</u>				Date: <u>2/10/08</u>				Time: <u>11:15</u>				Received by: <u>RM/GW</u>			
Relinquished by:				Date:				Time:				Received by:			
Logged by (Laboratory):				Date:				Time:				Checked by (Laboratory):			
Preservative Key: 1-HCl 2-HNO <sub>3</sub> 3-H <sub>2</sub> SO <sub>4</sub> 4-NaOH 5-Na <sub>2</sub> S <sub>2</sub> O <sub>3</sub> 6-NaHSO <sub>4</sub> 7-Other				8-4°C 9-5035											

QC Package: (Check One Box Below)		Cooler Temp		Cooler ID		Cooler Temp	
<input type="checkbox"/> Level II Std QC	<input type="checkbox"/> Level III Std QC/Raw Data	<input type="checkbox"/> Level IV SW846/CLP	<input type="checkbox"/> Other	<input type="checkbox"/> 2 WK Days	<input type="checkbox"/> 5 WK Days	<input type="checkbox"/> 10 Day TAT	<input type="checkbox"/> USACE-Level III Report

Notes: 10 Day TAT. USACE-Level III Report.

QC Package: (Check One Box Below) ☐ Level II Std QC ☐ Level III Std QC/Raw Data ☐ Level IV SW846/CLP ☒ Other

Cooler Temp: ☐ 2 WK Days ☐ 5 WK Days ☐ 10 Day TAT ☐ USACE-Level III Report

Cooler ID: ☐ 2 WK Days ☐ 5 WK Days ☐ 10 Day TAT ☐ USACE-Level III Report

Cooler Temp: ☐ 2 WK Days ☐ 5 WK Days ☐ 10 Day TAT ☐ USACE-Level III Report

QC Package: (Check One Box Below) ☐ Level II Std QC ☐ Level III Std QC/Raw Data ☐ Level IV SW846/CLP ☒ Other

Cooler Temp: ☐ 2 WK Days ☐ 5 WK Days ☐ 10 Day TAT ☐ USACE-Level III Report

Cooler ID: ☐ 2 WK Days ☐ 5 WK Days ☐ 10 Day TAT ☐ USACE-Level III Report

Cooler Temp: ☐ 2 WK Days ☐ 5 WK Days ☐ 10 Day TAT ☐ USACE-Level III Report

Note: 1. Any changes must be made in writing once samples and COC Form have been submitted to e-Lab Analytical, Inc.

2. Unless otherwise agreed in a formal contract, services provided by e-Lab Analytical, Inc. are expressly limited to the terms and conditions stated on the reverse.



e-Lab Analytical, Inc.  
3352 128th Avenue  
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Page        of       

11/30/2018

Customer Information						Project Information						Parameter/Method Request for Analysis						Work Order # 002300					
Purchase Order						Project Name						Oro Grande LF-Shallow Borings						VOC (5035/8260) Select					
Work Order						Project Number						5285-027						DRO					
Company Name						Bill To Company						Malcolm Pimle, Inc.						SVOC (8270) Select					
Send Report To						Invoice Attn						Michael Fortenza						Total Metals (6020/7000) Select					
Address						Address						1700 West Loop South Suite 1450						Pesticides, Chlorinated (8081)					
City/State/Zip						City/State/Zip						Houston, TX 77027						Herbicides (8151)					
Phone						Phone						(713) 840-1511						Total Cyanide (9012)					
Fax						Fax						(713) 840-1207						Phosphorus					
e-Mail Address						e-Mail Address												Moisture					
No.	Sample Description	Date	Time	Matrix	Pres.	# Bottles	A	B	C	D	E	F	G	H	J	Hold							
1	RINSATE-1	2-14-08	0830	H <sub>2</sub> O	VARIABLES	17	X	X	X	X	X	X	X										
2	RINSATE-2	2-14-08	0900	H <sub>2</sub> O	VARIABLES	17	X	X	X	X	X	X	X										
3																							
4																							
5																							
6																							
7																							
8																							
9																							
10																							

**Shipment Method:** FedEx  
**Required Turnaround Time:** (Check Box)  
☒ Std 10-WK Days    ☐ 5 WK Days    ☐ Other \_\_\_\_\_  
 Notes: 10 Day TAT. USACE-Level III Report.  
 Results Due Date: \_\_\_\_\_

**Sampler(s) Please Print & Sign:** DE ANZAROVA [Signature]  
**Relinquished by:** [Signature] Date: 2-14-08 Time: 1500  
**Relinquished by:** [Signature] Date: 2-14-08 Time: 1500  
**Logged by (Laboratory):** [Signature] Date: \_\_\_\_\_ Time: \_\_\_\_\_  
**Preservative Key:** 1-HCl 2-HNO<sub>3</sub> 3-H<sub>2</sub>SO<sub>4</sub> 4-NaOH 5-Na<sub>2</sub>S<sub>2</sub>O<sub>3</sub> 6-NaHSO<sub>4</sub> 7-Other \_\_\_\_\_  
**QC Package:** (Check One Box Below)  
☐ Level II Std QC    ☐ TRRP CheckList  
☐ Level III Std QC/Raw Data    ☐ TRRP Level IV  
☐ Level IV SW846/CLP    ☒ Other \_\_\_\_\_

**Note: 1** Any changes must be made in writing once samples and COC Form have been submitted to e-Lab Analytical, Inc.

Any changes must be made in writing once sampled into COOL and are expressly limited to the terms and conditions stated on the reverse.

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Sample Receipt Checklist

Client Name: MALCOLM PIRNIE

Date/Time Received: 2/15/2008 9:15:00 AM

Work Order Number 0802300

Received by: RNG

Checklist completed by *Robert H*  
Signature

2/15/08  
Date

Reviewed by *CR* 2/18/08  
Initials Date

Matrix:

Carrier name: FedEx

Shipping container/cooler in good condition?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	Not Present <input type="checkbox"/>
Custody seals intact on shipping container/cooler?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	Not Present <input type="checkbox"/>
Custody seals intact on sample bottles?	Yes <input type="checkbox"/>	No <input type="checkbox"/>	Not Present <input checked="" type="checkbox"/>
Chain of custody present?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Chain of custody signed when relinquished and received?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Chain of custody agrees with sample labels?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Samples in proper container/bottle?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Sample containers intact?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Sufficient sample volume for indicated test?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
All samples received within holding time?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Container/Temp Blank temperature in compliance?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	
Temperature(s)/Thermometer(s):	<u>2.0c, 2.2c, 1.9c</u>	<u>002</u>	
Cooler(s)/Kit(s):	<u>2306, 2058, 2072</u>		
Water - VOA vials have zero headspace?	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>	No VOA vials submitted <input type="checkbox"/>
Water - pH acceptable upon receipt?	Yes <input type="checkbox"/>	No <input type="checkbox"/>	N/A <input checked="" type="checkbox"/>

Adjusted?

Checked by

Login Notes: Trip blanks not on COC; logged in without analysis.

Client contacted: \_\_\_\_\_

Date contacted: \_\_\_\_\_

Person contacted \_\_\_\_\_

Contacted by: \_\_\_\_\_

Regarding: \_\_\_\_\_

Comments: \_\_\_\_\_

Corrective Action

# **Appendix D: Quality Control Summary Report**



U.S. Army Corps of Engineers  
RCRA Facility Investigation Report  
Oro Grande Landfill (SWMU-25/FTBL-14)



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**Oro Grande Landfill FTBL-14/SWMU-25**

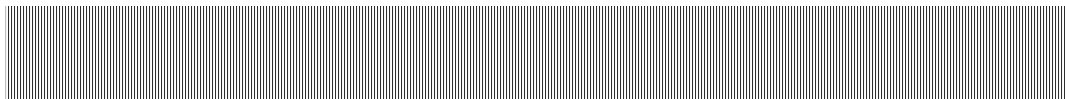
Fort Bliss, New Mexico

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# **Quality Control Summary Report**

## **February 2008 Sampling Event**

April 2008



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# 1. Project Scope

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This Quality Control Summary Report presents the data usability review for the soil and liquid samples collected on February 12 through 15, 2008 at the Oro Grande Landfill – FTBL-14/SWMU-25 (FTBL-14) in Fort Bliss, New Mexico. Data review was performed in accordance with the procedures specified in the United States Environmental Protection Agency (USEPA) Contract Laboratory Program National Functional Guidelines for Inorganic Data Review (EPA 540-R-04-004, October 2004) and Superfund Organic Methods Data Review (USEPA-540-R-04-009, January 2005), and quality control (QC) parameters set forth by e-Lab Analytical, Inc. (primary laboratory), located in Houston, Texas.





## 2. Project Description

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Twenty-one soil samples were collected at FTBL-14 during the sampling event. Additionally, three QC field duplicate soil samples, two equipment rinsate samples, two samples of investigation-derived waste (IDW), and eight trip blanks were collected during the sampling event. The primary samples, QC samples, equipment rinsate samples, IDW samples, and trip blanks were submitted to the primary laboratory for analyses. A complete list of samples, with field sample identifications, laboratory identifications, and analyses is presented in **Table 2-1**. The completed analyses consisted of the following:

- Volatile Organic Compounds (VOCs) by USEPA Method 8260B
- Total Petroleum Hydrocarbon Diesel Range Organics (TPH DRO) by USEPA Method 8015M
- Semivolatile Organic Compounds (SVOCs) by USEPA Method 8270
- Total Metals by USEPA Methods 6020/7470
- Chlorinated Pesticides by USEPA Method 8081
- Polychlorinated Biphenyls (PCBs) by USEPA Method 8082
- Herbicides by USEPA Method 8151
- Total Cyanide by USEPA Method 9014
- Total Phosphorus by USEPA Method 365.3
- Dissolved Silica by USEPA Method SM4500-SID

The metals analyte list consisted of aluminum, antimony, arsenic, barium, beryllium, boron, cadmium, calcium, chromium, cobalt, copper, iron, lead, lithium, magnesium, manganese, mercury, molybdenum, nickel, potassium, selenium, silver, sodium, strontium, thallium, tin, titanium, vanadium, and zinc. Six trip blanks were analyzed and two trip blanks were put on hold at the laboratory.

**TABLE 2-1**  
**SAMPLING AND ANALYSIS SCHEDULE**  
**FEBRUARY 2008**  
**Oro Grande Landfill FTBL-14/SWMU-25**  
**Fort Bliss, New Mexico**

Sample ID	Laboratory ID	Date Collected	Time	Sample Matrix	Sample Type	VOCs (8260B)	TPH DRO (8015M)	SVOCs (8270)	Total Metals (6020/7470)	Pesticides, Chlorinated (8081)	PCBs (8082)	Herbicides (8151)	Total Cyanide (9014)	Phosphorus (365.3)	Dissolved Silica (4500)
<b>Soil Samples</b>															
F14-SB-1 (0-2)	0802300-01	2/13/2008	16:35	Soil	N	X	X		X		X		X	X	X
F14-SB-1 (13-15)	0802300-02	2/13/2008	16:45	Soil	N	X	X		X	X	X	X	X	X	X
F14-SB-1 (28-30)	0802300-03	2/13/2008	17:15	Soil	N	X		X	X		X		X	X	X
F14-SB-2 (0-2)	0802326-05	2/15/2008	16:37	Soil	N	X	X		X		X		X	X	X
F14-SB-2 (13-15)	0802326-06	2/15/2008	17:05	Soil	N	X	X		X	X	X	X	X	X	X
F14-SB-2(28-30)	0802326-07	2/15/2008	19:00	Soil	N	X		X	X		X		X	X	X
F14-SB-3 (0-2)	0802326-01	2/14/2008	14:30	Soil	N	X	X		X		X		X	X	X
F14-SB-3 (13-15)	0802326-02	2/14/2008	15:00	Soil	N	X	X		X	X	X	X	X	X	X
F14-SB-3 (28-30)	0802326-03	2/15/2008	08:00	Soil	N	X		X	X		X		X	X	X
F14-SB-4 (0-2)	0802300-04	2/13/2008	15:25	Soil	N	X	X		X		X		X	X	X
F14-SB-4 (13-15)	0802300-05	2/13/2008	15:37	Soil	N	X	X		X	X	X	X	X	X	X
F14-SB-4 (28-30)	0802300-06	2/13/2008	15:55	Soil	N	X		X	X		X		X	X	X
F14-SB-5 (0-2)	0802326-08	2/15/2008	13:00	Soil	N	X	X		X		X		X	X	X
F14-SB-5 (13-15)	0802326-09	2/15/2008	13:10	Soil	N	X	X		X	X	X	X	X	X	X
F14-SB-5 (28-30)	0802326-10	2/15/2008	14:17	Soil	N	X		X	X		X		X	X	X
F14-SB-6 (0-2)	0802318-01	2/12/2008	16:10	Soil	N	X	X		X		X		X	X	X
F14-SB-6 (13-15)	0802318-02	2/12/2008	16:23	Soil	N	X	X		X	X	X	X	X	X	X
F14-SB-6 (28-30)	0802318-03	2/12/2008	16:46	Soil	N	X		X	X		X		X	X	X
F14-SB-6 (113-115)	0802318-04	2/12/2008	12:30	Soil	N	X		X	X				X	X	X
F14-SB-7 (0-1)	0802304-01	2/12/2008	13:30	Soil	N	X	X	X	X	X	X	X	X	X	X
F14-SB-8 (0-1)	0802304-02	2/12/2008	14:10	Soil	N	X	X	X	X	X	X	X	X	X	X
Dup-1	0802304-03	2/12/2008	--	Soil	FD of F14-SB-8 (0-1)	X	X	X	X	X	X	X	X	X	X
Dup-2	0802300-07	2/13/2008	--	Soil	FD of F14-SB-4 (28-30)	X	X	X	X		X		X	X	X
Dup-3	0802300-08	2/13/2008	--	Soil	FD of F14-SB-1 (28-30)	X	X		X	X	X	X	X	X	X
<b>Rinsate Samples</b>															
Rinsate-1	0802300-09	2/14/2008	08:30	Water	EB	X	X	X	X	X	X	X			
Rinsate-2	0802300-10	2/14/2008	09:00	Water	EB	X	X	X	X	X	X	X			

**TABLE 2-1**  
**SAMPLING AND ANALYSIS SCHEDULE**  
**FEBRUARY 2008**  
**Oro Grande Landfill FTBL-14/SWMU-25**  
**Fort Bliss, New Mexico**

Sample ID	Laboratory ID	Date Collected	Time	Sample Matrix	Sample Type	VOCs (8260B)	TPH DRO (8015M)	SVOCs (8270)	Total Metals (6020/7470)	Pesticides, Chlorinated (8081)	PCBs (8082)	Herbicides (8151)	Total Cyanide (9014)	Phosphorus (365.3)	Dissolved Silica (4500)
<b>IDW Samples</b>															
IDW-AQ	0802327-01	2/15/2008	12:00	Water	IDW	X	X	X	X	X	X	X			
IDW-Comp	0802326-04	2/14/2008	16:05	Soil	IDW	X	X	X	X	X	X	X	X	X	X
<b>Trip Blank</b>															
Trip Blank	0802304-04	2/12/2008	--	Water	TB	X									
Trip Blank	0802327-02	2/15/2008	--	Water	TB	X									
Trip Blank	0802318-05	2/13/2008	--	Water	TB	X									
Trip Blank 1	0802300-11	2/14/2008	--	Water	TB	X									
Trip Blank 2	0802300-12	2/14/2008	--	Water	TB	X									
Trip Blank 3	0802300-13	2/14/2008	--	Water	TB	X									
Trip Blank 2330	0802326-11	2/15/2008	--	Water	TB	<b>Hold</b>									
Trip Blank 1598	0802326-12	2/15/2008	--	Water	TB	<b>Hold</b>									

**Notes:**

EB = Equipment Blank

FD = Field Duplicate

Metals list consisted of aluminum, antimony, arsenic, barium, beryllium, boron, cadmium, calcium, chromium, cobalt, copper, iron, lead, lithium, magnesium, manganese, mercury, molybdenum, nickel, potassium, selenium, silver, sodium, strontium, thallium, tin, titanium, vanadium, and zinc.

N = Normal Sample

PCBs = Polychlorinated Biphenyls

SVOCs = Semivolatile Organic Compounds

TB = Trip Blank

TPH DRO = Total Petroleum Hydrocarbon Diesel Range Organics

VOCs = Volatile Organic Compounds

## 3. Quality Control Activities

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### 3.1. Quality Control Parameters

Malcolm Pirnie personnel performed data validation activities by reviewing the following quality control parameters as contained in the Level III reports prepared by the primary laboratory for laboratory report numbers 0802300, 0802304, 0802318, 0802326, and 0802327:

- Sample Preservation and Temperature Upon Laboratory Receipt
- Holding Times
- Method Blank Interference
- Surrogate Recovery
- Serial Dilutions (Metals only)
- Laboratory Control Sample/ Laboratory Control Sample Duplicate (LCS/LCSD) Recovery and Relative Percent Difference (RPD)
- Matrix Spike/Matrix Spike Duplicate (MS/MSD) Recovery and RPD
- Laboratory Duplicate Comparison (Inorganics only)
- Post Digest Spike (PDS) Recovery
- Field Duplicate Comparison
- Trip Blank Interference
- Rinsate Interference

Calibration data were not evaluated as part of this review. However, the calibration, continuing calibration, and raw data results are included in the laboratory reports. Results that required data qualification are presented in **Table 3-1** and are described in the following sections.

### 3.2. Laboratory Quality Control

#### 3.2.1. Data Qualifier Flags

Data qualifier flags are used by the laboratory and during data validation to notify the user of any possible uncertainty. Definitions of the data qualifiers/flags in this assessment are:

- J      This flag indicates a chemical has been positively identified; however, the analytical result should be considered an estimated value.

**TABLE 3-1**  
**OVERALL QUALIFIED ANALYTICAL RESULTS**  
**FEBRUARY 2008**  
**Oro Grande Landfill FTBL-14/SWMU-25**  
**Fort Bliss, New Mexico**

Sample ID	Laboratory ID	Analyte	Result	Units	Qualifier	Comments
F14-SB-1 (0-2)	0802300-01	Mercury	9.45	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-1 (0-2)	0802300-01	Antimony	<0.485	mg/Kg	UJ	Qualified due to low MS/MSD percent recovery
F14-SB-1 (0-2)	0802300-01	Beryllium	<0.485	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-1 (0-2)	0802300-01	Boron	<2.88	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-1 (0-2)	0802300-01	Cadmium	<0.485	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-1 (0-2)	0802300-01	Molybdenum	0.2	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-1 (0-2)	0802300-01	Selenium	0.445	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-1 (0-2)	0802300-01	Silver	0.0285	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-1 (0-2)	0802300-01	Thallium	0.0813	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-1 (0-2)	0802300-01	Tin	<2.43	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-1 (0-2)	0802300-01	Dichloromethane	5.1	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-1 (13-15)	0802300-02	Antimony	<0.467	mg/Kg	UJ	Qualified due to low MS/MSD percent recovery
F14-SB-1 (13-15)	0802300-02	Beryllium	<0.467	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-1 (13-15)	0802300-02	Boron	<4.73	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-1 (13-15)	0802300-02	Cadmium	<0.467	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-1 (13-15)	0802300-02	Molybdenum	0.173	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-1 (13-15)	0802300-02	Selenium	0.247	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-1 (13-15)	0802300-02	Silver	0.0281	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-1 (13-15)	0802300-02	Thallium	0.0591	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-1 (13-15)	0802300-02	Tin	<2.34	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-1 (13-15)	0802300-02	Dichloromethane	5.4	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-1 (28-30)	0802300-03	Antimony	<0.472	mg/Kg	UJ	Qualified due to low MS/MSD percent recovery
F14-SB-1 (28-30)	0802300-03	Barium	24.6	mg/Kg	J	Qualified due to high field duplicate RPD
F14-SB-1 (28-30)	0802300-03	Beryllium	<0.472	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-1 (28-30)	0802300-03	Cadmium	<0.472	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-1 (28-30)	0802300-03	Molybdenum	0.256	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-1 (28-30)	0802300-03	Selenium	0.407	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-1 (28-30)	0802300-03	Silver	0.0204	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-1 (28-30)	0802300-03	Strontium	80.4	mg/Kg	J	Qualified due to high field duplicate RPD
F14-SB-1 (28-30)	0802300-03	Thallium	0.0836	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-1 (28-30)	0802300-03	Tin	<2.36	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-1 (28-30)	0802300-03	Dichloromethane	5.2	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-1 (28-30)	0802300-03	Total Phosphorus	50	mg/Kg	J	Qualified due to high field duplicate RPD
F14-SB-1 (28-30)	0802300-03	Bis(2-ethylhexyl)phthalate	14	ug/Kg	J	Qualified due to equipment rinsate sample detection
F14-SB-4 (0-2)	0802300-04	Mercury	5.24	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-4 (0-2)	0802300-04	Antimony	<0.481	mg/Kg	UJ	Qualified due to low MS/MSD percent recovery
F14-SB-4 (0-2)	0802300-04	Beryllium	<0.481	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-4 (0-2)	0802300-04	Boron	<5.12	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-4 (0-2)	0802300-04	Cadmium	<0.481	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-4 (0-2)	0802300-04	Molybdenum	0.208	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-4 (0-2)	0802300-04	Silver	0.027	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-4 (0-2)	0802300-04	Thallium	0.0798	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-4 (0-2)	0802300-04	Tin	<2.40	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-4 (0-2)	0802300-04	Dichloromethane	5.7	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-4 (13-15)	0802300-05	Antimony	<0.450	mg/Kg	UJ	Qualified due to low MS/MSD percent recovery
F14-SB-4 (13-15)	0802300-05	Beryllium	<0.450	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-4 (13-15)	0802300-05	Boron	<3.01	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-4 (13-15)	0802300-05	Cadmium	<0.450	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-4 (13-15)	0802300-05	Molybdenum	0.186	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-4 (13-15)	0802300-05	Selenium	0.221	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-4 (13-15)	0802300-05	Silver	0.0189	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-4 (13-15)	0802300-05	Thallium	0.053	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-4 (13-15)	0802300-05	Tin	<2.25	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-4 (13-15)	0802300-05	Dichloromethane	4.8	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-4 (28-30)	0802300-06	Antimony	<0.439	mg/Kg	UJ	Qualified due to low MS/MSD percent recovery
F14-SB-4 (28-30)	0802300-06	Beryllium	<0.439	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-4 (28-30)	0802300-06	Boron	<3.81	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-4 (28-30)	0802300-06	Cadmium	<0.439	mg/Kg	UJ	Qualified due to method blank detection

**TABLE 3-1**  
**OVERALL QUALIFIED ANALYTICAL RESULTS**  
**FEBRUARY 2008**  
**Oro Grande Landfill FTBL-14/SWMU-25**  
**Fort Bliss, New Mexico**

Sample ID	Laboratory ID	Analyte	Result	Units	Qualifier	Comments
F14-SB-4 (28-30)	0802300-06	Molybdenum	0.177	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-4 (28-30)	0802300-06	Selenium	0.286	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-4 (28-30)	0802300-06	Silver	0.0201	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-4 (28-30)	0802300-06	Sodium	79.3	mg/Kg	J	Qualified due to high field duplicate RPD
F14-SB-4 (28-30)	0802300-06	Thallium	0.0522	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-4 (28-30)	0802300-06	Tin	<2.19	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-4 (28-30)	0802300-06	Dichloromethane	6.2	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-4 (28-30)	0802300-06	Total Phosphorus	41.2	mg/Kg	J	Qualified due to high field duplicate RPD
F14-SB-4 (28-30)	0802300-06	Dissolved Silica	28.5	mg/Kg	J	Qualified due to high field duplicate RPD
DUP-2	0802300-07	TPH DRO	0.82	mg/Kg	J	Estimated; analyte detected between MDL and RL
DUP-2	0802300-07	Antimony	<0.472	mg/Kg	UJ	Qualified due to low MS/MSD percent recovery
DUP-2	0802300-07	Beryllium	<0.472	mg/Kg	UJ	Qualified due to method blank detection
DUP-2	0802300-07	Boron	<4.62	mg/Kg	UJ	Qualified due to method blank detection
DUP-2	0802300-07	Cadmium	<0.472	mg/Kg	UJ	Qualified due to method blank detection
DUP-2	0802300-07	Molybdenum	0.196	mg/Kg	J	Estimated; analyte detected between MDL and RL
DUP-2	0802300-07	Selenium	0.272	mg/Kg	J	Estimated; analyte detected between MDL and RL
DUP-2	0802300-07	Silver	0.0193	mg/Kg	J	Estimated; analyte detected between MDL and RL
DUP-2	0802300-07	Sodium	217	mg/Kg	J	Qualified due to high field duplicate RPD
DUP-2	0802300-07	Thallium	0.0554	mg/Kg	J	Estimated; analyte detected between MDL and RL
DUP-2	0802300-07	Tin	<2.36	mg/Kg	UJ	Qualified due to method blank detection
DUP-2	0802300-07	Dichloromethane	4.5	ug/Kg	J	Estimated; analyte detected between MDL and RL
DUP-2	0802300-07	Total Phosphorus	59	mg/Kg	J	Qualified due to high field duplicate RPD
DUP-2	0802300-07	Dissolved Silica	20.1	mg/Kg	J	Qualified due to high field duplicate RPD
DUP-2	0802300-07	Bis(2-ethylhexyl)phthalate	13	ug/Kg	J	Qualified due to equipment rinsate sample detection
DUP-3	0802300-08	Antimony	<0.455	mg/Kg	UJ	Qualified due to low MS/MSD percent recovery
DUP-3	0802300-08	Barium	83.7	mg/Kg	J	Qualified due to high field duplicate RPD
DUP-3	0802300-08	Beryllium	<0.455	mg/Kg	UJ	Qualified due to method blank detection
DUP-3	0802300-08	Boron	<6.67	mg/Kg	UJ	Qualified due to method blank detection
DUP-3	0802300-08	Cadmium	<0.455	mg/Kg	UJ	Qualified due to method blank detection
DUP-3	0802300-08	Molybdenum	0.214	mg/Kg	J	Estimated; analyte detected between MDL and RL
DUP-3	0802300-08	Selenium	0.344	mg/Kg	J	Estimated; analyte detected between MDL and RL
DUP-3	0802300-08	Strontium	110	mg/Kg	J	Qualified due to high field duplicate RPD
DUP-3	0802300-08	Thallium	0.0589	mg/Kg	J	Estimated; analyte detected between MDL and RL
DUP-3	0802300-08	Tin	<2.27	mg/Kg	UJ	Qualified due to method blank detection
DUP-3	0802300-08	Dichloromethane	5.2	ug/Kg	J	Estimated; analyte detected between MDL and RL
DUP-3	0802300-08	Total Phosphorus	158	mg/Kg	J	Qualified due to high field duplicate RPD
Rinsate-1	0802300-09	Selenium	0.00179	mg/L	J	Estimated; analyte detected between MDL and RL
F14-SB-3 (0-2)	0802326-01	TPH DRO	0.51	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-3 (0-2)	0802326-01	Mercury	7.8	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-3 (0-2)	0802326-01	Antimony	<0.463	mg/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (0-2)	0802326-01	Barium	124	mg/Kg	J	Qualified due to high laboratory duplicate RPD and MS/MSD percent recovery outliers
F14-SB-3 (0-2)	0802326-01	Beryllium	0.269	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-3 (0-2)	0802326-01	Cadmium	0.0548	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-3 (0-2)	0802326-01	Copper	<2.15	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-3 (0-2)	0802326-01	Manganese	74.6	mg/Kg	J	Qualified due to high MSD percent recovery
F14-SB-3 (0-2)	0802326-01	Molybdenum	0.216	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-3 (0-2)	0802326-01	Selenium	<0.709	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-3 (0-2)	0802326-01	Silver	<0.463	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-3 (0-2)	0802326-01	Tin	<2.31	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-3 (0-2)	0802326-01	1,2,4-Trichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (0-2)	0802326-01	1,2-Dichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (0-2)	0802326-01	1,3-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (0-2)	0802326-01	1,4-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (0-2)	0802326-01	Bromodichloromethane	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (0-2)	0802326-01	Chlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (0-2)	0802326-01	Chloroform	<0.90	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (0-2)	0802326-01	cis-1,2-Dichloroethene	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery



**TABLE 3-1**  
**OVERALL QUALIFIED ANALYTICAL RESULTS**  
**FEBRUARY 2008**  
**Oro Grande Landfill FTBL-14/SWMU-25**  
**Fort Bliss, New Mexico**

Sample ID	Laboratory ID	Analyte	Result	Units	Qualifier	Comments
F14-SB-3 (0-2)	0802326-01	Dibromochloromethane	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (0-2)	0802326-01	Methyl tert-butyl ether	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (0-2)	0802326-01	Toluene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (0-2)	0802326-01	Dissolved Silica	9.37	mg/Kg	J	Qualified due to low MS percent recovery
F14-SB-3 (13-15)	0802326-02	Antimony	<0.485	mg/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (13-15)	0802326-02	Barium	36.1	mg/Kg	J	Qualified due to high laboratory duplicate RPD and MS/MSD percent recovery outliers
F14-SB-3 (13-15)	0802326-02	Beryllium	0.184	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-3 (13-15)	0802326-02	Copper	<1.26	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-3 (13-15)	0802326-02	Manganese	52.3	mg/Kg	J	Qualified due to high MSD percent recovery
F14-SB-3 (13-15)	0802326-02	Molybdenum	0.157	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-3 (13-15)	0802326-02	Selenium	<0.485	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-3 (13-15)	0802326-02	Silver	<0.485	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-3 (13-15)	0802326-02	Tin	<2.43	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-3 (13-15)	0802326-02	1,2,4-Trichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (13-15)	0802326-02	1,2-Dichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (13-15)	0802326-02	1,3-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (13-15)	0802326-02	1,4-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (13-15)	0802326-02	Bromodichloromethane	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (13-15)	0802326-02	Chlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (13-15)	0802326-02	Chloroform	<0.90	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (13-15)	0802326-02	cis-1,2-Dichloroethene	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (13-15)	0802326-02	Dibromochloromethane	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (13-15)	0802326-02	Methyl tert-butyl ether	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (13-15)	0802326-02	Toluene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (13-15)	0802326-02	Dissolved Silica	9.21	mg/Kg	J	Qualified due to low MS percent recovery
F14-SB-3 (28-30)	0802326-03	Antimony	<0.485	mg/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (28-30)	0802326-03	Barium	58.7	mg/Kg	J	Qualified due to high laboratory duplicate RPD and MS/MSD percent recovery outliers
F14-SB-3 (28-30)	0802326-03	Beryllium	0.213	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-3 (28-30)	0802326-03	Cadmium	0.038	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-3 (28-30)	0802326-03	Copper	<1.64	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-3 (28-30)	0802326-03	Manganese	79	mg/Kg	J	Qualified due to high MSD percent recovery
F14-SB-3 (28-30)	0802326-03	Molybdenum	0.225	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-3 (28-30)	0802326-03	Selenium	<0.538	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-3 (28-30)	0802326-03	Silver	<0.485	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-3 (28-30)	0802326-03	Tin	<2.43	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-3 (28-30)	0802326-03	1,2,4-Trichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (28-30)	0802326-03	1,2-Dichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (28-30)	0802326-03	1,3-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (28-30)	0802326-03	1,4-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (28-30)	0802326-03	Bromodichloromethane	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (28-30)	0802326-03	Chlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (28-30)	0802326-03	Chloroform	<0.90	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (28-30)	0802326-03	cis-1,2-Dichloroethene	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (28-30)	0802326-03	Dibromochloromethane	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (28-30)	0802326-03	Methyl tert-butyl ether	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (28-30)	0802326-03	Toluene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-3 (28-30)	0802326-03	Dissolved Silica	13.4	mg/Kg	J	Qualified due to low MS percent recovery
F14-SB-2 (0-2)	0802326-05	TPH DRO	1.6	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-2 (0-2)	0802326-05	Mercury	3.56	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-2 (0-2)	0802326-05	Antimony	0.199	mg/Kg	J	Qualified due to low MS percent recovery
F14-SB-2 (0-2)	0802326-05	Barium	60	mg/Kg	J	Qualified due to high laboratory duplicate RPD and MS/MSD percent recovery outliers
F14-SB-2 (0-2)	0802326-05	Beryllium	0.254	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-2 (0-2)	0802326-05	Cadmium	0.0519	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-2 (0-2)	0802326-05	Copper	<2.1	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-2 (0-2)	0802326-05	Manganese	73.3	mg/Kg	J	Qualified due to high MSD percent recovery

**TABLE 3-1**  
**OVERALL QUALIFIED ANALYTICAL RESULTS**  
**FEBRUARY 2008**  
**Oro Grande Landfill FTBL-14/SWMU-25**  
**Fort Bliss, New Mexico**

Sample ID	Laboratory ID	Analyte	Result	Units	Qualifier	Comments
F14-SB-2 (0-2)	0802326-05	Molybdenum	0.246	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-2 (0-2)	0802326-05	Selenium	<0.472	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-2 (0-2)	0802326-05	Silver	<0.472	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-2 (0-2)	0802326-05	Thallium	0.0651	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-2 (0-2)	0802326-05	Tin	<2.36	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-2 (0-2)	0802326-05	1,2,4-Trichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (0-2)	0802326-05	1,2-Dichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (0-2)	0802326-05	1,3-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (0-2)	0802326-05	1,4-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (0-2)	0802326-05	Bromodichloromethane	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (0-2)	0802326-05	Chlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (0-2)	0802326-05	Chloroform	<0.90	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (0-2)	0802326-05	cis-1,2-Dichloroethene	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (0-2)	0802326-05	Dibromochloromethane	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (0-2)	0802326-05	Methyl tert-butyl ether	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (0-2)	0802326-05	Toluene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (0-2)	0802326-05	Dissolved Silica	29.6	mg/Kg	J	Qualified due to low MS percent recovery
F14-SB-2 (13-15)	0802326-06	Antimony	<0.481	mg/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (13-15)	0802326-06	Barium	30	mg/Kg	J	Qualified due to high laboratory duplicate RPD and MS/MSD percent recovery outliers
F14-SB-2 (13-15)	0802326-06	Beryllium	0.147	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-2 (13-15)	0802326-06	Copper	<0.911	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-2 (13-15)	0802326-06	Manganese	32.9	mg/Kg	J	Qualified due to high MSD percent recovery
F14-SB-2 (13-15)	0802326-06	Molybdenum	0.119	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-2 (13-15)	0802326-06	Selenium	<0.481	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-2 (13-15)	0802326-06	Silver	<0.481	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-2 (13-15)	0802326-06	Tin	<2.40	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-2 (13-15)	0802326-06	1,2,4-Trichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (13-15)	0802326-06	1,2-Dichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (13-15)	0802326-06	1,3-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (13-15)	0802326-06	1,4-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (13-15)	0802326-06	Bromodichloromethane	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (13-15)	0802326-06	Chlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (13-15)	0802326-06	Chloroform	<0.90	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (13-15)	0802326-06	cis-1,2-Dichloroethene	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (13-15)	0802326-06	Dibromochloromethane	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (13-15)	0802326-06	Methyl tert-butyl ether	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (13-15)	0802326-06	Toluene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (13-15)	0802326-06	Dissolved Silica	8.71	mg/Kg	J	Qualified due to low MS percent recovery
F14-SB-2 (28-30)	0802326-07	Mercury	2.19	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-2 (28-30)	0802326-07	Antimony	0.193	mg/Kg	J	Qualified due to low MS percent recovery
F14-SB-2 (28-30)	0802326-07	Barium	94.4	mg/Kg	J	Qualified due to high laboratory duplicate RPD and MS/MSD percent recovery outliers
F14-SB-2 (28-30)	0802326-07	Beryllium	0.255	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-2 (28-30)	0802326-07	Cadmium	0.0637	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-2 (28-30)	0802326-07	Copper	<2.00	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-2 (28-30)	0802326-07	Manganese	85.8	mg/Kg	J	Qualified due to high MSD percent recovery
F14-SB-2 (28-30)	0802326-07	Molybdenum	0.358	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-2 (28-30)	0802326-07	Selenium	<0.525	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-2 (28-30)	0802326-07	Silver	<0.476	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-2 (28-30)	0802326-07	Thallium	0.0921	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-2 (28-30)	0802326-07	Tin	<2.38	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-2 (28-30)	0802326-07	1,2,4-Trichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (28-30)	0802326-07	1,2-Dichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (28-30)	0802326-07	1,3-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (28-30)	0802326-07	1,4-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (28-30)	0802326-07	Bromodichloromethane	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (28-30)	0802326-07	Chlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery



**TABLE 3-1**  
**OVERALL QUALIFIED ANALYTICAL RESULTS**  
**FEBRUARY 2008**  
**Oro Grande Landfill FTBL-14/SWMU-25**  
**Fort Bliss, New Mexico**

Sample ID	Laboratory ID	Analyte	Result	Units	Qualifier	Comments
F14-SB-2 (28-30)	0802326-07	Chloroform	<0.90	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (28-30)	0802326-07	cis-1,2-Dichloroethene	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (28-30)	0802326-07	Dibromochloromethane	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (28-30)	0802326-07	Methyl tert-butyl ether	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (28-30)	0802326-07	Toluene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-2 (28-30)	0802326-07	Dissolved Silica	16.9	mg/Kg	J	Qualified due to low MS percent recovery
F14-SB-5 (0-2)	0802326-08	Mercury	1.97	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-5 (0-2)	0802326-08	Antimony	<0.459	mg/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (0-2)	0802326-08	Barium	79.3	mg/Kg	J	Qualified due to high laboratory duplicate RPD and MS/MSD percent recovery outliers
F14-SB-5 (0-2)	0802326-08	Beryllium	0.225	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-5 (0-2)	0802326-08	Cadmium	0.0415	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-5 (0-2)	0802326-08	Copper	<1.8	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-5 (0-2)	0802326-08	Manganese	75.1	mg/Kg	J	Qualified due to high MSD percent recovery
F14-SB-5 (0-2)	0802326-08	Molybdenum	0.212	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-5 (0-2)	0802326-08	Selenium	<0.576	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-5 (0-2)	0802326-08	Silver	<0.459	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-5 (0-2)	0802326-08	Sodium	42.6	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-5 (0-2)	0802326-08	Thallium	0.529	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-5 (0-2)	0802326-08	Tin	<2.29	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-5 (0-2)	0802326-08	1,2,4-Trichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (0-2)	0802326-08	1,2-Dichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (0-2)	0802326-08	1,3-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (0-2)	0802326-08	1,4-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (0-2)	0802326-08	Bromodichloromethane	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (0-2)	0802326-08	Chlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (0-2)	0802326-08	Chloroform	<0.90	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (0-2)	0802326-08	cis-1,2-Dichloroethene	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (0-2)	0802326-08	Dibromochloromethane	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (0-2)	0802326-08	Methyl tert-butyl ether	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (0-2)	0802326-08	Toluene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (0-2)	0802326-08	Dissolved Silica	17.8	mg/Kg	J	Qualified due to low MS percent recovery
F14-SB-5 (13-15)	0802326-09	Antimony	<0.472	mg/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (13-15)	0802326-09	Barium	24.8	mg/Kg	J	Qualified due to high laboratory duplicate RPD and MS/MSD percent recovery outliers
F14-SB-5 (13-15)	0802326-09	Beryllium	0.145	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-5 (13-15)	0802326-09	Copper	<0.913	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-5 (13-15)	0802326-09	Manganese	36.2	mg/Kg	J	Qualified due to high MSD percent recovery
F14-SB-5 (13-15)	0802326-09	Molybdenum	0.168	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-5 (13-15)	0802326-09	Selenium	<0.472	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-5 (13-15)	0802326-09	Silver	<0.472	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-5 (13-15)	0802326-09	Tin	<2.36	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-5 (13-15)	0802326-09	1,2,4-Trichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (13-15)	0802326-09	1,2-Dichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (13-15)	0802326-09	1,3-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (13-15)	0802326-09	1,4-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (13-15)	0802326-09	Bromodichloromethane	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (13-15)	0802326-09	Chlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (13-15)	0802326-09	Chloroform	<0.90	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (13-15)	0802326-09	cis-1,2-Dichloroethene	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (13-15)	0802326-09	Dibromochloromethane	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (13-15)	0802326-09	Methyl tert-butyl ether	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (13-15)	0802326-09	Toluene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (13-15)	0802326-09	Dissolved Silica	13	mg/Kg	J	Qualified due to low MS percent recovery
F14-SB-5 (28-30)	0802326-10	Antimony	<0.485	mg/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (28-30)	0802326-10	Barium	28.7	mg/Kg	J	Qualified due to high laboratory duplicate RPD and MS/MSD percent recovery outliers
F14-SB-5 (28-30)	0802326-10	Beryllium	0.354	mg/Kg	J	Estimated; analyte detected between MDL and RL

**TABLE 3-1**  
**OVERALL QUALIFIED ANALYTICAL RESULTS**  
**FEBRUARY 2008**  
**Oro Grande Landfill FTBL-14/SWMU-25**  
**Fort Bliss, New Mexico**

Sample ID	Laboratory ID	Analyte	Result	Units	Qualifier	Comments
F14-SB-5 (28-30)	0802326-10	Cadmium	0.0637	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-5 (28-30)	0802326-10	Manganese	84.1	mg/Kg	J	Qualified due to high MSD percent recovery
F14-SB-5 (28-30)	0802326-10	Molybdenum	0.124	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-5 (28-30)	0802326-10	Selenium	<0.583	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-5 (28-30)	0802326-10	Silver	<0.485	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-5 (28-30)	0802326-10	Thallium	0.0667	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-5 (28-30)	0802326-10	Tin	<2.43	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-5 (28-30)	0802326-10	Benzo(k)fluoranthene	6.6	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-5 (28-30)	0802326-10	1,2,4-Trichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (28-30)	0802326-10	1,2-Dichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (28-30)	0802326-10	1,3-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (28-30)	0802326-10	1,4-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (28-30)	0802326-10	Bromodichloromethane	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (28-30)	0802326-10	Chlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (28-30)	0802326-10	Chloroform	<0.90	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (28-30)	0802326-10	cis-1,2-Dichloroethene	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (28-30)	0802326-10	Dibromochloromethane	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (28-30)	0802326-10	Methyl tert-butyl ether	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (28-30)	0802326-10	Toluene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-5 (28-30)	0802326-10	Dissolved Silica	30.8	mg/Kg	J	Qualified due to low MS percent recovery
F14-SB-6 (0-2)	0802318-01	Mercury	10	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (0-2)	0802318-01	Antimony	<0.446	mg/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-6 (0-2)	0802318-01	Barium	69.8	mg/Kg	J	Qualified due to high laboratory duplicate RPD and MS/MSD percent recovery outliers
F14-SB-6 (0-2)	0802318-01	Beryllium	0.298	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (0-2)	0802318-01	Boron	1.98	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (0-2)	0802318-01	Cadmium	0.0591	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (0-2)	0802318-01	Manganese	100	mg/Kg	J	Qualified due to high MSD percent recovery
F14-SB-6 (0-2)	0802318-01	Molybdenum	0.133	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (0-2)	0802318-01	Selenium	<0.493	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-6 (0-2)	0802318-01	Silver	<0.446	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-6 (0-2)	0802318-01	Thallium	0.0537	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (0-2)	0802318-01	Tin	<2.23	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-6 (0-2)	0802318-01	Dichloromethane	5.9	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (13-15)	0802318-02	Antimony	0.173	mg/Kg	J	Qualified due to low MS percent recovery
F14-SB-6 (13-15)	0802318-02	Barium	31.2	mg/Kg	J	Qualified due to high laboratory duplicate RPD and MS/MSD percent recovery outliers
F14-SB-6 (13-15)	0802318-02	Beryllium	0.185	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (13-15)	0802318-02	Cadmium	0.0391	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (13-15)	0802318-02	Copper	<1.17	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-6 (13-15)	0802318-02	Manganese	47.3	mg/Kg	J	Qualified due to high MSD percent recovery
F14-SB-6 (13-15)	0802318-02	Molybdenum	0.248	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (13-15)	0802318-02	Selenium	<0.476	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-6 (13-15)	0802318-02	Silver	<0.476	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-6 (13-15)	0802318-02	Thallium	0.0746	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (13-15)	0802318-02	Tin	<2.38	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-6 (13-15)	0802318-02	Dichloromethane	4.9	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (28-30)	0802318-03	Antimony	<0.472	mg/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-6 (28-30)	0802318-03	Barium	46.2	mg/Kg	J	Qualified due to high laboratory duplicate RPD and MS/MSD percent recovery outliers
F14-SB-6 (28-30)	0802318-03	Beryllium	0.254	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (28-30)	0802318-03	Cadmium	0.0345	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (28-30)	0802318-03	Manganese	88.2	mg/Kg	J	Qualified due to high MSD percent recovery
F14-SB-6 (28-30)	0802318-03	Molybdenum	0.309	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (28-30)	0802318-03	Selenium	<0.472	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-6 (28-30)	0802318-03	Silver	<0.472	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-6 (28-30)	0802318-03	Thallium	0.00517	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (28-30)	0802318-03	Tin	<2.36	mg/Kg	UJ	Qualified due to method blank detection

**TABLE 3-1**  
**OVERALL QUALIFIED ANALYTICAL RESULTS**  
**FEBRUARY 2008**  
**Oro Grande Landfill FTBL-14/SWMU-25**  
**Fort Bliss, New Mexico**

Sample ID	Laboratory ID	Analyte	Result	Units	Qualifier	Comments
F14-SB-6 (28-30)	0802318-03	Dichloromethane	5.4	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (113-115)	0802318-04	Antimony	<0.476	mg/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-6 (113-115)	0802318-04	Barium	79.8	mg/Kg	J	Qualified due to high laboratory duplicate RPD and MS/MSD percent recovery outliers
F14-SB-6 (113-115)	0802318-04	Beryllium	0.292	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (113-115)	0802318-04	Cadmium	0.0309	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (113-115)	0802318-04	Manganese	83.1	mg/Kg	J	Qualified due to high MSD percent recovery
F14-SB-6 (113-115)	0802318-04	Molybdenum	0.172	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (113-115)	0802318-04	Selenium	<0.476	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-6 (113-115)	0802318-04	Silver	<0.476	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-6 (113-115)	0802318-04	Thallium	0.0554	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-6 (113-115)	0802318-04	Tin	<2.38	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-6 (113-115)	0802318-04	Dichloromethane	5.3	ug/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-7 (0-1)	0802304-01	Antimony	<0.439	mg/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-7 (0-1)	0802304-01	Barium	37.5	mg/Kg	J	Qualified due to high laboratory duplicate RPD and MS/MSD percent recovery outliers
F14-SB-7 (0-1)	0802304-01	Beryllium	0.23	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-7 (0-1)	0802304-01	Boron	1.95	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-7 (0-1)	0802304-01	Cadmium	0.058	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-7 (0-1)	0802304-01	Copper	<1.69	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-7 (0-1)	0802304-01	Manganese	67.7	mg/Kg	J	Qualified due to high MSD percent recovery
F14-SB-7 (0-1)	0802304-01	Molybdenum	0.197	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-7 (0-1)	0802304-01	Selenium	<0.439	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-7 (0-1)	0802304-01	Silver	<0.439	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-7 (0-1)	0802304-01	Sodium	19.3	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-7 (0-1)	0802304-01	Thallium	0.149	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-7 (0-1)	0802304-01	Tin	<2.19	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-7 (0-1)	0802304-01	Dichloromethane	3.8	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-8 (0-1)	0802304-02	TPH DRO	0.51	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-8 (0-1)	0802304-02	Antimony	<0.467	mg/Kg	UJ	Qualified due to low MS percent recovery
F14-SB-8 (0-1)	0802304-02	Barium	35.9	mg/Kg	J	Qualified due to high laboratory duplicate RPD and MS/MSD percent recovery outliers
F14-SB-8 (0-1)	0802304-02	Beryllium	0.196	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-8 (0-1)	0802304-02	Boron	1.45	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-8 (0-1)	0802304-02	Copper	<1.72	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-8 (0-1)	0802304-02	Manganese	59.2	mg/Kg	J	Qualified due to high MSD percent recovery
F14-SB-8 (0-1)	0802304-02	Molybdenum	0.1	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-8 (0-1)	0802304-02	Selenium	<0.467	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-8 (0-1)	0802304-02	Silver	<0.467	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-8 (0-1)	0802304-02	Thallium	0.0576	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-8 (0-1)	0802304-02	Tin	<2.34	mg/Kg	UJ	Qualified due to method blank detection
F14-SB-8 (0-1)	0802304-02	Dichloromethane	3.9	mg/Kg	J	Estimated; analyte detected between MDL and RL
F14-SB-8 (0-1)	0802304-02	Total Phosphorus	19.4	mg/Kg	J	Qualified due to high field duplicate RPD
F14-SB-8 (0-1)	0802304-02	Dissolved Silica	18.3	mg/Kg	J	Qualified due to high field duplicate RPD
Dup-1	0802304-03	Antimony	<0.485	mg/Kg	UJ	Qualified due to low MS percent recovery
Dup-1	0802304-03	Barium	34	mg/Kg	J	Qualified due to high laboratory duplicate RPD and MS/MSD percent recovery outliers
Dup-1	0802304-03	Beryllium	0.21	mg/Kg	J	Estimated; analyte detected between MDL and RL
Dup-1	0802304-03	Boron	1.31	mg/Kg	J	Estimated; analyte detected between MDL and RL
Dup-1	0802304-03	Copper	<1.99	mg/Kg	UJ	Qualified due to method blank detection
Dup-1	0802304-03	Manganese	60.5	mg/Kg	J	Qualified due to high MSD percent recovery
Dup-1	0802304-03	Molybdenum	0.132	mg/Kg	J	Estimated; analyte detected between MDL and RL
Dup-1	0802304-03	Selenium	<0.485	mg/Kg	UJ	Qualified due to method blank detection
Dup-1	0802304-03	Silver	<0.485	mg/Kg	UJ	Qualified due to method blank detection
Dup-1	0802304-03	Tin	<2.43	mg/Kg	UJ	Qualified due to method blank detection
Dup-1	0802304-03	Total Phosphorus	64	mg/Kg	J	Qualified due to high field duplicate RPD
Dup-1	0802304-03	Dissolved Silica	35.8	mg/Kg	J	Qualified due to high field duplicate RPD
IDW-AQ	0802327-01	beta-BHC	0.027	ug/Kg	J	Qualified due to dual column results RPD > 40%

**TABLE 3-1**  
**OVERALL QUALIFIED ANALYTICAL RESULTS**  
**FEBRUARY 2008**  
**Oro Grande Landfill FTBL-14/SWMU-25**  
**Fort Bliss, New Mexico**

Sample ID	Laboratory ID	Analyte	Result	Units	Qualifier	Comments
IDW-AQ	0802327-01	Selenium	<0.005	mg/L	UJ	Qualified due to method blank detection
IDW-AQ	0802327-01	Chloroform	0.64	ug/Kg	J	Estimated; analyte detected between MDL and RL
IDW-Comp	0802326-04	Antimony	<0.481	mg/Kg	UJ	Qualified due to low MS percent recovery
IDW-Comp	0802326-04	Barium	69.7	mg/Kg	J	Qualified due to high laboratory duplicate RPD and MS/MSD percent recovery outliers
IDW-Comp	0802326-04	Beryllium	0.233	mg/Kg	J	Estimated; analyte detected between MDL and RL
IDW-Comp	0802326-04	Cadmium	0.0378	mg/Kg	J	Estimated; analyte detected between MDL and RL
IDW-Comp	0802326-04	Copper	<1.81	mg/Kg	UJ	Qualified due to method blank detection
IDW-Comp	0802326-04	Manganese	76	mg/Kg	J	Qualified due to high MSD percent recovery
IDW-Comp	0802326-04	Molybdenum	0.216	mg/Kg	J	Estimated; analyte detected between MDL and RL
IDW-Comp	0802326-04	Selenium	<0.579	mg/Kg	UJ	Qualified due to method blank detection
IDW-Comp	0802326-04	Silver	<0.481	mg/Kg	UJ	Qualified due to method blank detection
IDW-Comp	0802326-04	Tin	<2.40	mg/Kg	UJ	Qualified due to method blank detection
IDW-Comp	0802326-04	1,2,4-Trichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
IDW-Comp	0802326-04	1,2-Dichlorobenzene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
IDW-Comp	0802326-04	1,3-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
IDW-Comp	0802326-04	1,4-Dichlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
IDW-Comp	0802326-04	Bromodichloromethane	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
IDW-Comp	0802326-04	Chlorobenzene	<0.70	ug/Kg	UJ	Qualified due to low MS percent recovery
IDW-Comp	0802326-04	Chloroform	<0.90	ug/Kg	UJ	Qualified due to low MS percent recovery
IDW-Comp	0802326-04	cis-1,2-Dichloroethene	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
IDW-Comp	0802326-04	Dibromochloromethane	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
IDW-Comp	0802326-04	Methyl tert-butyl ether	<0.80	ug/Kg	UJ	Qualified due to low MS percent recovery
IDW-Comp	0802326-04	Toluene	<0.60	ug/Kg	UJ	Qualified due to low MS percent recovery
IDW-Comp	0802326-04	Dissolved Silica	19.6	mg/Kg	J	Qualified due to low MS percent recovery

**Notes:**

J = Analyte has been positively identified; however the result should be considered an estimated value

MDL = Method Detection Limit

mg/Kg = milligram per kilogram

mg/L = milligram per liter

MS = Matrix Spike

MSD = Matrix Spike Duplicate

RL = Reporting Limit

RPD = Relative Percent Difference

ug/Kg = micrograms per kilogram

UJ = Analyte was not detected above the Reporting Limit; however, the Reporting Limit is considered an estimated value

< = Analyte is not detected at the listed reporting limit

UJ This flag indicates that the analyte was not detected above the reporting limit; however, the reported limit is considered an estimated value.

### 3.2.2. Sample Preservation and Temperature upon Laboratory Receipt

Samples were received intact and at the correct temperatures.

### 3.2.3. Holding Times

All samples were extracted and analyzed within the holding time limits as set forth by the respective USEPA methods.

### 3.2.4. Method Blank Interference

No target analytes were detected in the method blanks with the exceptions listed in **Table 3-2**.

**Table 3-2**  
**Summary of Method Blank Interferences**

Parameter	Analytical Batch	Analyte	RL [mg/Kg]	Result [mg/Kg]
Metals	28303	Beryllium	0.5	0.04139 J
Metals	28303	Boron	2.5	0.6935 J
Metals	28303	Cadmium	0.5	0.04304 J
Metals	28303	Chromium	0.5	0.09404 J
Metals	28303	Magnesium	50	3.905 J
Metals	28303	Potassium	50	6.417 J
Metals	28303	Tin	2.5	1.189 J
Metals	28318	Selenium	0.005	0.002029 J
Metals	28320	Barium	0.5	0.1763 J
Metals	28320	Copper	0.5	0.2296 J
Metals	28320	Selenium	0.5	0.2529 J
Metals	28320	Silver	0.5	0.1023 J
Metals	28320	Tin	2.5	1.129 J
Metals	28320	Vanadium	0.5	0.1491 J
Metals	28320	Aluminum	1	0.6331 J

- Beryllium, cadmium, and tin detections in method blank associated with the analytical batch 28303 led to data qualification of beryllium, cadmium, and tin analytical results for soil samples F14-SB-1 (0-2), F14-SB-1 (13-15), F14-SB-1 (28-30), F14-SB-4 (0-2), F14-SB-4 (13-15), F14-SB-4 (28-30), DUP-2, and DUP-3



with a “UJ” qualifier as shown in **Table 3-1** to indicate potential method blank interference.

- Boron detection in method blank associated with the analytical batch 28303 led to data qualification of boron analytical results for soil samples F14-SB-1 (0-2), F14-SB-1 (13-15), F14-SB-4 (0-2), F14-SB-4 (13-15), F14-SB-4 (28-30), DUP-2, and DUP-3 with a “UJ” qualifier as shown in **Table 3-1** to indicate potential method blank interference.
- Chromium, magnesium, and potassium detections in method blank associated with the analytical batch 28303 did not lead to data qualification as the concentrations in the associated soil samples were greater than ten times the concentrations in the method blank.
- Selenium detection in method blank associated with the analytical batch 28318 led to data qualification of selenium analytical results for water samples IDW-AQ and Rinsate-1 with a “UJ” qualifier as shown in **Table 3-1** to indicate potential method blank interference.
- Aluminum, barium, and vanadium detections in method blank associated with the analytical batch 28320 did not lead to data qualification as the concentrations in the associated samples were greater than ten times the concentrations in the method blank.
- Copper detection in method blank associated with the analytical batch 28320 led to data qualification of copper analytical results in soil samples F14-SB-2 (0-2), F14-SB-2 (13-15), F14-SB-2 (28-30), F14-SB-3 (0-2), F14-SB-3 (13-15), F14-SB-3 (28-30), F14-SB-5 (0-2), F14-SB-5 (13-15), F14-SB-6 (13-15), F14-SB-7 (0-1), F14-SB-8 (0-1), Dup-1, and IDW-Comp as shown in **Table 3-1** to indicate potential method blank interference.
- Selenium, silver, and tin detections in method blank associated with the analytical batch 28320 led to data qualification of selenium, silver, and tin analytical results in soil samples F14-SB-2 (0-2), F14-SB-2 (13-15), F14-SB-2 (28-30), F14-SB-3 (0-2), F14-SB-3 (13-15), F14-SB-3 (28-30), F14-SB-5 (0-2), F14-SB-5 (13-15), F14-SB-5 (28-30), F14-SB-6 (0-2), F14-SB-6 (13-15), F14-SB-6 (28-30), F14-SB-6 (113-115), F14-SB-7 (0-1), F14-SB-8 (0-1), Dup-1, and IDW-Comp with a “UJ” qualifier as shown in **Table 3-1** to indicate potential method blank interference.

### 3.2.5. Surrogate Recovery

Surrogate recoveries for organics analyses were within the acceptance limits.

### 3.2.6. Serial Dilutions

The serial dilution of samples quantitated by Inductively Coupled Plasma (ICP) technique determines whether or not significant physical or chemical interferences exist due to sample matrix. Serial dilutions were within the acceptance limits.

### 3.2.7. Laboratory Control Sample/ Laboratory Control Sample Duplicate Recovery and Relative Percent Difference

LCS/LCSD were performed at the required frequency and LCS/LCSD percent recoveries and RPDs were within acceptance limits.

### 3.2.8. Matrix Spike/Matrix Spike Duplicate Recovery and RPD

MS/MSD were performed at the required frequency and MS/MSD percent recoveries and RPDs were within acceptance limits with the exceptions listed in **Table 3-3**.

- MS/MSD percent recovery outliers for aluminum, calcium, manganese, and strontium associated with the analytical batch 28303 did not lead to data qualification as the concentrations of these chemicals in the soil samples were greater than four times the spike values.
- Low MS/MSD percent recoveries for antimony associated with the analytical batch 28303 led to the qualification of antimony analytical results for the soil samples F14-SB-1 (0-2), F14-SB-1 (13-15), F14-SB-1 (28-30), F14-SB-2 (0-2), F14-SB-2 (13-15), F14-SB-2 (28-30), DUP-2, and DUP-3 with a “UJ” qualifier as shown in **Table 3-1** to indicate potential low bias.
- MS/MSD RPD exceedance for pentachlorophenol associated with the analytical batch 28295 did not lead to data qualification as the MS and MSD percent recoveries were both within the control limits.
- High MS percent recovery for total phosphorus associated with the analytical batch R60110 did not lead to data qualification as the concentration of total phosphorus in the soil sample was greater than four times the spike value.
- Low MS percent recovery for dissolved silica associated with the analytical batch R60293 did not lead to data qualification as the MS percent recovery was very close to the control limits.
- Low MS percent recovery for antimony associated with the analytical batch 28320 led to the qualification of antimony analytical results for the soil samples F14-SB-3 (0-2), F14-SB-3 (13-15), F14-SB-3 (28-30), IDW-Comp, F14-SB-2 (0-2), F14-SB-2 (13-15), F14-SB-2 (28-30), F14-SB-5 (0-2), F14-SB-5 (13-15), F14-SB-5 (28-30), F14-SB-6 (0-2), F14-SB-6 (13-15), F14-SB-6 (28-30), F14-SB-6 (113-115), F14-SB-7 (0-1), F14-SB-8 (0-1), and Dup-1 with a “J” or “UJ” qualifier as shown in **Table 3-1** to indicate potential low bias.
- MS/MSD percent recovery outliers for aluminum and calcium associated with the analytical batch 28320 did not lead to data qualification as the concentrations of these chemicals in the soil samples were greater than four times the spike value.

**TABLE 3-3**  
**SUMMARY OF MATRIX SPIKE/MATRIX SPIKE DUPLICATE OUTLIERS**  
**FEBRUARY 2008**  
**Oro Grande Landfill FTBL-14/SWMU-25**  
**Fort Bliss, New Mexico**

Parameter	Sample ID	Analytical Batch	Analyte	MS % Recovery	MSD % Recovery	Control Limits %	% RPD	% RPD Limits
Metals	F14-SB-1 (13-15)	28303	Aluminum	6180	5970	75-125	0.613	25
Metals	F14-SB-1 (13-15)	28303	Antimony	56.2	52.8	75-125	6.17	25
Metals	F14-SB-1 (13-15)	28303	Calcium	88	174	75-125	5.01	25
Metals	F14-SB-1 (13-15)	28303	Manganese	59.1	31.5	75-125	5.38	25
Metals	F14-SB-1 (13-15)	28303	Strontium	91.9	180	75-125	11.8	25
SVOCs	F14-SB-1 (28-30)	28295	Pentachlorophenol	89.9	63.7	20-145	34	30
Phosphorus	F14-SB-1 (0-2)	R60110	Total Phosphorus	206	--	80-120	--	--
Silica	F14-SB-1 (0-2)	R60293	Dissolved Silica	79.4	--	80-120	--	--
Metals	F14-SB-2 (13-15)	28320	Antimony	65.4	67.5	75-125	3.01	25
Metals	F14-SB-2 (13-15)	28320	Barium	492	-16	75-125	92.3	25
Metals	F14-SB-2 (13-15)	28320	Calcium	41	15	75-125	2.18	25
Metals	F14-SB-2 (13-15)	28320	Manganese	94.2	188	75-125	19.5	25
Metals	F14-SB-2 (13-15)	28320	Strontium	619	108	75-125	62.5	25
Metals	F14-SB-2 (13-15)	28320	Aluminum	5840	5680	75-125	0.532	25
VOCs	F14-SB-3 (0-2)	R60320	1,1,2-Trichloroethane	78.7	92.7	79-120	16.4	30
VOCs	F14-SB-3 (0-2)	R60320	1,1-Dichloroethane	74	85.5	75-124	14.5	30
VOCs	F14-SB-3 (0-2)	R60320	1,2,4-Trichlorobenzene	70.8	81	74-128	13.3	30
VOCs	F14-SB-3 (0-2)	R60320	1,2-Dichlorobenzene	71.2	81.7	79-120	13.7	30
VOCs	F14-SB-3 (0-2)	R60320	1,2-Dichloropropane	75.9	89.8	76-120	16.8	30
VOCs	F14-SB-3 (0-2)	R60320	1,3-Dichlorobenzene	72.9	83.5	79-120	13.6	30
VOCs	F14-SB-3 (0-2)	R60320	1,4-Dichlorobenzene	72.2	83	77-120	13.9	30
VOCs	F14-SB-3 (0-2)	R60320	Bromodichloromethane	76.7	89.4	79-121	15.3	30
VOCs	F14-SB-3 (0-2)	R60320	Chlorobenzene	76.9	88.9	79-120	14.5	30
VOCs	F14-SB-3 (0-2)	R60320	Chloroform	76.2	87.3	78-120	13.6	30
VOCs	F14-SB-3 (0-2)	R60320	cis-1,2-Dichloroethene	76.7	84.6	80-120	9.77	30
VOCs	F14-SB-3 (0-2)	R60320	Dibromochloromethane	75.2	89.2	78-122	17	30
VOCs	F14-SB-3 (0-2)	R60320	Ethylbenzene	79.2	91.1	80-122	14	30
VOCs	F14-SB-3 (0-2)	R60320	Methyl tert-butyl ether	71.2	84.3	76-121	16.8	30
VOCs	F14-SB-3 (0-2)	R60320	Toluene	77.8	89	79-120	13.5	30
VOCs	F14-SB-3 (0-2)	R60320	Total Xylenes	79.8	91.2	80-120	13.4	30
Phosphorus	F14-SB-5 (28-30)	28396	Total Phosphorus	-44	NA	80-120	NC	NC
Silica	F14-SB-3 (13-15)	R60294	Dissolved Silica	73.8	NA	80-120	NC	NC

**Notes:**

MS = Matrix Spike

MSD = Matrix Spike Duplicate

NA = Not Analyzed

NC = Not Calculated

RPD = Relative Percent Difference

SVOCs = Semivolatile Organic Compounds

VOCs = Volatile Organic Compounds



- MS/MSD percent recovery outliers and RPD exceedance for barium associated with the analytical batch 28320 led to the qualification of barium analytical results for the soil samples F14-SB-3 (0-2), F14-SB-3 (13-15), F14-SB-3 (28-30), IDW-Comp, F14-SB-2 (0-2), F14-SB-2 (13-15), F14-SB-2 (28-30), F14-SB-5 (0-2), F14-SB-5 (13-15), F14-SB-5 (28-30), F14-SB-6 (0-2), F14-SB-6 (13-15), F14-SB-6 (28-30), F14-SB-6 (113-115), F14-SB-7 (0-1), F14-SB-8 (0-1), and Dup-1 with a “J” qualifier as shown in **Table 3-1** to indicate potential bias.
- High MSD percent recovery for manganese associated with the analytical batch 28320 led to the qualification of manganese analytical results for the soil samples F14-SB-3 (0-2), F14-SB-3 (13-15), F14-SB-3 (28-30), IDW-Comp, F14-SB-2 (0-2), F14-SB-2 (13-15), F14-SB-2 (28-30), F14-SB-5 (0-2), F14-SB-5 (13-15), F14-SB-5 (28-30), F14-SB-6 (0-2), F14-SB-6 (13-15), F14-SB-6 (28-30), F14-SB-6 (113-115), F14-SB-7 (0-1), F14-SB-8 (0-1), and Dup-1 with a “J” qualifier to indicate potential high bias.
- MS/MSD percent recovery outliers and RPD exceedance for strontium associated with the analytical batch 28320 did not lead to data qualification as the concentrations of strontium in the soil samples were greater than four times the spike value.
- Low MS percent recoveries for 1,1,2-trichloroethane and 1,1-dichloroethane associated with the analytical batch R60320 did not lead to data qualification as the MSD percent recoveries were within control limits and MS percent recoveries were very close to the control limits.
- Low MS percent recoveries for 1,2,4-trichlorobenzene, 1,2-dichlorobenzene, 1,3-dichlorobenzene, 1,4-dichlorobenzene, bromodichloromethane, chlorobenzene, chloroform, cis-1,2-dichloroethene, dibromochloromethane, and methyl tert-butyl ether associated with the analytical batch R60320 led to the qualification of analytical results for the soil samples F14-SB-3 (0-2), F14-SB-3 (13-15), F14-SB-3 (28-30), F14-SB-2 (0-2), F14-SB-2 (13-15), F14-SB-2 (28-30), F14-SB-5 (0-2), F14-SB-5 (13-15), F14-SB-5 (28-30), and IDW-Comp with a “UJ” qualifier to indicate potential low bias.
- Low MS percent recoveries for 1,2-dichloropropane, ethylbenzene, and total xylenes associated with the analytical batch R60320 did not lead to data qualification as the MSD percent recoveries were within control limits and MS percent recoveries were very close to the control limits.
- Low MS percent recovery for toluene associated with the analytical batch R60320 led to the qualification of analytical results for the soil samples F14-SB-3 (0-2), F14-SB-3 (13-15), F14-SB-3 (28-30), F14-SB-2 (0-2), F14-SB-2 (13-15), F14-SB-2 (28-30), F14-SB-5 (0-2), F14-SB-5 (13-15), F14-SB-5 (28-30), and IDW-Comp with a “UJ” qualifier to indicate potential low bias.
- Low MS percent recovery for total phosphorus associated with the analytical batch 28396 did not lead to data qualification as the concentration of total phosphorus in the soil samples were greater than four times the spike value.

- Low MS percent recovery for dissolved silica associated with the analytical batch R60294 led to the qualification of analytical results for the soil samples F14-SB-3 (0-2), F14-SB-3 (13-15), F14-SB-3 (28-30), F14-SB-2 (0-2), F14-SB-2 (13-15), F14-SB-2 (28-30), F14-SB-5 (0-2), F14-SB-5 (13-15), F14-SB-5 (28-30), and IDW-Comp with a “J” qualifier to indicate potential low bias.

### 3.2.9. Laboratory Duplicate Comparison

Laboratory duplicate samples were analyzed for the February 2008 sampling event. The RPDs between the primary sample and duplicate sample results were calculated. The RPDs were evaluated based on the acceptance criteria of 25% when the sample result is greater than five times the reporting limit. The laboratory duplicate RPDs were within acceptance limits with the exception presented in **Table 3-4**.

**Table 3-4**  
**Laboratory Duplicate Summary**

<b>Analyses</b>	<b>Analytical Batch</b>	<b>Analyte</b>	<b>RPD %</b>	<b>RPD Limit %</b>
Metals	28320	Barium	27.6	25

- High RPD percentages of barium led to the qualification of the barium analytical results for soil samples F14-SB-3 (0-2), F14-SB-3 (13-15), F14-SB-3 (28-30), IDW-Comp, F14-SB-2 (0-2), F14-SB-2 (13-15), F14-SB-2 (28-30), F14-SB-5 (0-2), F14-SB-5 (13-15), F14-SB-5 (28-30), F14-SB-6 (0-2), F14-SB-6 (13-15), F14-SB-6 (28-30), F14-SB-6 (113-115), F14-SB-7 (0-1), F14-SB-8 (0-1), and Dup-1 with a “J” qualifier as shown in **Table 3-1**.

### 3.2.10. Post Digestion Spike Recovery

A post digestion spike (PDS) is used to assess analytical interferences and provides information on matrix effects such as suppression or enhancement of instrument signal. The PDS recoveries were within the control limits.

### 3.2.11. Field Duplicate Comparison

Three field duplicate soil samples were collected and submitted for analyses during the February 2008 sampling event. The RPDs between the field samples and their associated duplicate samples were calculated and are presented in **Table 3-5**.

**TABLE 3-5**  
**FIELD DUPLICATE SUMMARY**  
**FEBRUARY 2008**  
**Oro Grande Landfill FTBL-14/SWMU-25**  
**Fort Bliss, New Mexico**

Sample ID/ Field Duplicate ID	Parameters	Sample Result	QC Duplicate Result	QC RPD (%)
F14-SB-8 (0-1) /Dup-1	<b>TPH DRO (mg/Kg)</b>			
	DRO	0.51 J	<0.5	NC
	<b>Metals (mg/Kg)</b>			
	Aluminum	2970	2980	0.3%
	Arsenic	1.35	1.35	0.0%
	Barium	35.9 J	34 J	NC
	Beryllium	0.196 J	0.210 J	NC
	Boron	1.45 J	1.31 J	NC
	Calcium	7060	7460	5.5%
	Chromium	3.38	3.44	1.8%
	Cobalt	1.23	1.27	3.2%
	Copper	<1.72 UJ	<1.99 UJ	NC
	Iron	3690	3850	4.2%
	Lead	2.87	3.03	5.4%
	Lithium	ND	ND	NC
	Magnesium	1050	1100	4.7%
	Manganese	59.2 J	60.5 J	NC
	Molybdenum	0.100 J	0.132 J	NC
	Nickel	2.49	2.59	3.9%
	Potassium	695	753	8.0%
	Selenium	<0.467 UJ	<0.485 UJ	NC
	Silver	<0.467 UJ	<0.485 UJ	NC
	Sodium	ND	ND	NC
	Strontium	20.8	20.3	2.4%
	Thallium	0.0576 J	<0.049	NC
	Tin	<2.34 UJ	<2.43 UJ	NC
	Titanium	81.1	80	1.4%
	Vanadium	7.26	7.37	1.5%
	Zinc	8.33	8.71	4.5%
	All other analytes	ND	ND	NC
	<b>Semivolatile Organic Compounds (ug/Kg)</b>			
	Bis(2-ethylhexyl)phthalate	15	18	18.2%
	Di-n-butyl phthalate	11	10	9.5%
	All other analytes	ND	ND	NC
	<b>Volatile Organic Compounds (ug/Kg)</b>			
	Dichloromethane	3.9 J	<3	NC
	All other analytes	ND	ND	NC
	<b>Phosphorus (mg/Kg)</b>			
	Total Phosphorus	19.4	64	<b>107.0%</b>
	All other analytes	ND	ND	NC
	<b>Dissolved Silica (mg/Kg)</b>	18.3	35.8	<b>64.7%</b>

**TABLE 3-5**  
**FIELD DUPLICATE SUMMARY**  
**FEBRUARY 2008**  
**Oro Grande Landfill FTBL-14/SWMU-25**  
**Fort Bliss, New Mexico**

Sample ID/ Field Duplicate ID	Parameters	Sample Result	QC Duplicate Result	QC RPD (%)
F14-SB-4 (28-30) /Dup-2	<b>TPH DRO (mg/Kg)</b>			
	DRO	NA	0.82 J	NC
	<b>Metals (mg/Kg)</b>			
	Aluminum	4360	5030	14.3%
	Arsenic	1.74	1.92	9.8%
	Barium	27.5	27.6	0.4%
	Beryllium	<0.439 UJ	<0.472 UJ	NC
	Boron	<3.81 UJ	<4.62 UJ	NC
	Cadmium	<0.439 UJ	<0.472 UJ	NC
	Calcium	28300	24500	14.4%
	Chromium	3.1	3.47	11.3%
	Cobalt	1.33	1.38	3.7%
	Copper	1.3	1.53	16.3%
	Iron	3190	3730	15.6%
	Lead	2.56	2.84	10.4%
	Lithium	7.69	9.97	25.8%
	Magnesium	2350	2740	15.3%
	Manganese	50.6	56.1	10.3%
	Molybdenum	0.177 J	0.196 J	NC
	Nickel	2.6	2.96	12.9%
	Potassium	1190	1380	14.8%
	Selenium	0.286 J	0.272 J	NC
	Silver	0.0201 J	0.0193 J	NC
	Sodium	79.3	217	92.9%
	Strontium	96.4	94.7	1.8%
	Thallium	0.0522 J	0.0554 J	NC
	Tin	<2.19 UJ	<2.36 UJ	NC
	Titanium	69.8	84.4	18.9%
	Vanadium	9.53	10.9	13.4%
	Zinc	7.45	8.65	14.9%
	All other analytes	ND	ND	NC
	<b>Semivolatile Organic Compounds (ug/Kg)</b>			
	Bis(2-ethylhexyl)phthalate	15	13 J	NC
	Caprolactam	120	<6.6	NC
	Di-n-butyl phthalate	13	11	16.7%
	All other analytes	ND	ND	NC
	<b>Volatile Organic Compounds (ug/Kg)</b>			
	Dichloromethane	6.2 J	4.5 J	NC
	All other analytes	ND	ND	NC
	<b>Phosphorus (mg/Kg)</b>			
	Total Phosphorus	41.2	59	35.5%
	All other analytes	ND	ND	NC
	<b>Dissolved Silica (mg/Kg)</b>	28.5	20.1	34.6%

**TABLE 3-5**  
**FIELD DUPLICATE SUMMARY**  
**FEBRUARY 2008**  
**Oro Grande Landfill FTBL-14/SWMU-25**  
**Fort Bliss, New Mexico**

Sample ID/ Field Duplicate ID	Parameters	Sample Result	QC Duplicate Result	QC RPD (%)
F14-SB-1 (28-30) /Dup-3	<b>Metals (mg/Kg)</b>			
	Aluminum	6000	5830	2.9%
	Arsenic	3.38	4.08	18.8%
	Barium	24.6	83.7	<b>109.1%</b>
	Beryllium	<0.472 UJ	<0.455 UJ	NC
	Boron	7.42	<6.67 UJ	NC
	Cadmium	<0.472 UJ	<0.455 UJ	NC
	Calcium	32700	29400	10.6%
	Chromium	4.14	4.18	1.0%
	Cobalt	1.96	2.15	9.2%
	Copper	1.87	2.14	13.5%
	Iron	4640	5080	9.1%
	Lead	3.22	3.76	15.5%
	Lithium	9.3	8.79	5.6%
	Magnesium	3720	3720	0.0%
	Manganese	72	85	16.6%
	Molybdenum	0.256 J	0.214 J	NC
	Nickel	3.78	3.59	5.2%
	Potassium	1700	1610	5.4%
	Selenium	0.407 J	0.344 J	NC
	Silver	0.0204 J	<0.018	NC
	Sodium	433	452	4.3%
	Strontium	80.4	110	<b>31.1%</b>
	Thallium	0.0836 J	0.0589 J	NC
	Tin	<2.36 UJ	<2.27 UJ	NC
	Titanium	102	118	14.5%
	Vanadium	17.8	23	25.5%
	Zinc	10.5	11.9	12.5%
	All other analytes	ND	ND	NC
	<b>Semivolatile Organic Compounds (ug/Kg)</b>			
	Bis(2-ethylhexyl)phthalate	14 J	NA	NC
	Caprolactam	25	NA	NC
	Di-n-butyl phthalate	11	NA	NC
	All other analytes	ND	ND	NC
	<b>Volatile Organic Compounds (ug/Kg)</b>			
	Dichloromethane	5.2 J	5.2 J	NC
	All other analytes	ND	ND	NC
	<b>Phosphorus (mg/Kg)</b>			
	Total Phosphorus	50	158	<b>103.8%</b>
	All other analytes	ND	ND	NC
	<b>Dissolved Silica (mg/Kg)</b>			
		14	11.9	16.2%

**Notes:**

Bolded value represent RPD outliers

J = Analyte has been positively identified; however the result should be considered an estimated value

mg/Kg = milligram per kilogram

NA = Sample was not analyzed for analyte

NC = Not calculated; RPD values were not calculated for non-detects or trace values

ND = Value was not above the Reporting Limit for that particular analyte

QC = Quality Control

RPD = Relative Percent Difference

ug/Kg = micrograms per kilogram

< = Analyte is not detected at the listed reporting limit

The field duplicate evaluation criteria are as follows:

- If an analyte is detected at a concentration greater than five times the RL, the RPD should be less than 30%.
- If an analyte is detected in the field sample and duplicate split, but its concentration is less than five times the RL, the difference between the concentration in the field sample and that of the duplicate split should not exceed the RL.

The RPD values, or the differences in the sample concentrations, were calculated from QC samples with reference to the primary sample. All RPD values were within the control limits with the following exceptions:

- Total phosphorus and dissolved silica analytical results for soil sample F14-SB-8 (0-1) and its associated split sample Dup-1 were qualified with a “J” qualifier as shown in **Table 3-1** due to a field duplicate RPD outlier.
- Sodium, total phosphorus, and dissolved silica analytical results for soil sample F14-SB-4 (28-30) and its associated split sample Dup-2 were qualified with a “J” qualifier as shown in **Table 3-1** due to a field duplicate RPD outlier.
- Barium, strontium, and total phosphorus analytical results for soil sample F14-SB-1 (28-30) and its associated split sample Dup-3 were qualified with a “J” qualifier as shown in **Table 3-1** due to a field duplicate RPD outlier.

#### **3.2.12. Trip Blank**

Trip blanks were transported to and from FTBL-14 in the coolers used to transfer samples to be analyzed for VOCs during the sampling event. The liquid trip blanks were analyzed for VOCs. No analytes were detected in the trip blanks.

#### **3.2.13. Equipment Rinsate Sample**

No analytes were detected in the equipment rinsate samples with the exceptions presented in **Table 3-6**.

**Table 3-6  
Equipment Rinsate Sample Summary**

<b>Parameter</b>	<b>Sample ID</b>	<b>Analyte</b>	<b>Reporting Limit [mg/L]</b>	<b>Result [mg/L]</b>
Pesticides	Rinsate-1	delta-BHC	0.05	0.066
Metals	Rinsate-1	Selenium	5	1.79 J
SVOCs	Rinsate-1	Bis(2-ethylhexyl)phthalate	0.2	1.5
SVOCs	Rinsate-2	Bis(2-ethylhexyl)phthalate	0.2	0.46

The list below describes the equipment rinsate sample qualifications:

- Delta-BHC detection in Rinsate-1 did not lead to data qualification as delta-BHC was reported to be non-detect in the associated soil samples.
- Selenium detection in Rinsate-1 did not lead to data qualification as selenium was detected in the associated soil samples at a concentrations greater than 10 times the concentration of selenium in Rinsate-1.
- Bis(2-ethylhexyl)phthalate detections in Rinsate-1 and Rinsate-2 led to the qualification of bis(2-ethylhexyl)phthalate analytical results in soil samples F14-SB-1 (28-30) and Dup-2 with a “J” qualifier as shown in **Table 3-1** to show potential rinsate interference.

## 4. Evaluation of Quality Control Parameters

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The data quality for the sampling at FTBL-14 site has been measured and evaluated in terms of specific indicators:

- Precision
- Bias
- Representativeness
- Comparability
- Completeness
- Sensitivity

Many of these indicators are evaluated in a quantitative manner and acceptance limits are described in each section below. Two of these parameters are more qualitative in nature (i.e., representativeness and comparability). The following sections describe the data quality indicators and the quality of these data.

### 4.1. Precision

Precision is a measure of the reproducibility of analytical results under a given set of conditions. MS/MSD, LCS/LCSD, and laboratory duplicates are analyzed to determine analytical precision. Sampling precision is demonstrated through collection and analysis of field duplicates. Precision is measured by calculating the RPD. No results were qualified due to LCS/LCSD and MS/MSD RPD exceedances. Barium analytical results were qualified due to laboratory and field duplicate RPD outliers. Sodium, strontium, dissolved silica and total phosphorus analytical results were qualified due to field duplicate RPD outliers. A good measure of precision is contained in the Field Duplicate Summary presented in **Table 3-5**.

### 4.2. Bias

Bias refers to the systematic or persistent distortion of a measurement process that causes errors in one direction (above or below the true value or mean). Accuracy is a measure of closeness between an observed value and the ‘true’ value, but it does not differentiate between random error and systematic error (i.e. bias). Bias is impacted by errors introduced through the sampling process, handling, analytical procedures, and the sample matrix. Bias is evaluated through the collection and analysis of PDS, MS/MSD, LCS, and surrogate compounds. MS/MSD percent recovery outliers indicated potentially biased analytical results as shown in **Table 3-1**.



### 4.3. Representativeness

Representativeness is a qualitative parameter that evaluates the degree to which sample data accurately and precisely represent a characteristic of a population, a sampling point, or an environmental condition. Sample handling protocols (e.g., collection, storage, preservation, and transportation) have been established to ensure samples are representative of field conditions. The overall representativeness of the data is good as indicated by the adherence to sample handling protocols.

### 4.4. Comparability

Comparability is a qualitative parameter that expresses the confidence with which one data set may be compared to another. This is a concern when current data are being integrated with historical data. Three soil duplicate samples were collected and analyzed. The comparison of the project laboratory results for the primary samples to the QC samples is shown in **Table 3-5**. Analytical results for the primary and QC samples were generally in agreement for the detected compounds.

### 4.5. Completeness

Completeness is a measure of the amount of valid data obtained compared to the total number of measurements planned. Completeness is evaluated qualitatively and quantitatively. The qualitative evaluation of completeness is determined as a function of the events contributing to the sampling event. This includes items such as samples arriving at the laboratory intact, properly preserved, and in sufficient quantity to perform the requested analyses all of which were achieved.

The quantitative description of completeness is defined as the percentage of QC parameters that are acceptable.

- Contractual completeness is defined as the number of samples that have not been qualified for QC reasons divided by the number of requested sample results, multiplied by 100.
- Technical completeness is defined as the total number of usable (not rejected) results divided by the number of requested sample results, multiplied by 100.

The completeness goal for sample holding times is 100%; for all other QC parameters, the goal is 90%. **Table 4-1** summarizes the technical and contractual percent compliances.

**TABLE 4-1**  
**DATA USABILITY SUMMARY**  
**FEBRUARY 2008**  
**Oro Grande Landfill FTBL-14/SWMU-25**  
**Fort Bliss, New Mexico**

Parameters		Total Number of Samples	Number in Contractual Compliance	Percent Contractual Compliance	Number of Usable Results	Percent Technical Compliance
<b>PCBs</b>						
	All analytes	25	25	100	25	100
<b>TPH DRO</b>		19	19	100	19	100
<b>Metals</b>						
	Antimony	26	1 <sup>a</sup>	4	26	100
	Barium	26	7 <sup>a,b,c</sup>	27	26	100
	Beryllium	26	18 <sup>d</sup>	69	26	100
	Boron	26	19 <sup>d</sup>	73	26	100
	Cadmium	26	18 <sup>d</sup>	69	26	100
	Copper	26	13 <sup>d</sup>	50	26	100
	Manganese	26	9 <sup>a</sup>	35	26	100
	Selenium	26	8 <sup>d</sup>	31	26	100
	Silver	26	9 <sup>d</sup>	35	26	100
	Sodium	26	24 <sup>b</sup>	92	26	100
	Strontium	26	24 <sup>b</sup>	92	26	100
	Tin	26	1 <sup>d</sup>	4	26	100
	All other analytes	26	26	100	26	100
<b>Volatile Organic Compounds</b>						
	1,2,4-Trichlorobenzene	26	16 <sup>a</sup>	62	26	100
	1,2-Dichlorobenzene	26	16 <sup>a</sup>	62	26	100
	1,3-Dichlorobenzene	26	16 <sup>a</sup>	62	26	100
	1,4-Dichlorobenzene	26	16 <sup>a</sup>	62	26	100
	Bromodichloromethane	26	16 <sup>a</sup>	62	26	100
	Chlorobenzene	26	16 <sup>a</sup>	62	26	100
	Chloroform	26	16 <sup>a</sup>	62	26	100
	cis-1,2-Dichloroethene	26	16 <sup>a</sup>	62	26	100
	Dibromochloromethane	26	16 <sup>a</sup>	62	26	100
	Methyl tert-butyl ether	26	16 <sup>a</sup>	62	26	100
	Toluene	26	16 <sup>a</sup>	62	26	100
	All other analytes	26	26	100	26	100
<b>Total Phosphorus</b>		25	19 <sup>b</sup>	76	25	100
<b>Dissolved Silica</b>		25	11 <sup>a,b</sup>	44	25	100
<b>Total Cyanide</b>		25	25	100	25	100
<b>Pesticides</b>						
	beta-BHC	12	11 <sup>e</sup>	92	12	100
	All other analytes	12	12	100	12	100
<b>Herbicides</b>						
	All analytes	12	12	100	12	100
<b>Semivolatile Organic Compounds</b>						
	Bis(2-ethylhexyl)phthalate	13	11 <sup>f</sup>	85	13	100
	All other analytes	13	13	100	13	100

**Notes:**

Total number of samples included field samples as well as QC samples

Percent Contractual Compliance = [Number of contract compliant results/Number of reported Results] \* 100

Percent Technical Compliance = [Number of usable results/Number of reported results] \* 100

<sup>a</sup> Results qualified due to MS/MSD percent recovery outliers

<sup>b</sup> Results qualified due to high field duplicate RPD

<sup>c</sup> Results qualified due to high laboratory duplicate RPD

<sup>d</sup> Results qualified due to method blank detection

<sup>e</sup> Results qualified due to dual column results RPD > 40%

<sup>f</sup> Results qualified due to equipment rinsate sample detection

PCBs = Polychlorinated Biphenyls

QC = quality control

TPH DRO = Total Petroleum Hydrocarbon Diesel Range Organics

Project data were within technical compliance control limits for all analytes.

- PCB analyses were in 100% contractual compliance.
- TPH DRO analyses were in 100% contractual compliance.
- Metals analyses were in 100% contractual compliance with the exceptions of antimony, barium, beryllium, boron, cadmium, copper, manganese, selenium, silver, sodium, strontium, and tin.
- VOCs analyses were in 100% contractual compliance with the exceptions of 1,2,4-trichlorobenzene, 1,2-dichlorobenzene, 1,3-dichlorobenzene, 1,4-dichlorobenzene, bromodichloromethane, chlorobenzene, chloroform, cis-1,2-dichloroethene, dibromochloromethane, methyl tert-butyl ether, and toluene.
- Total phosphorus analyses were in 76% contractual compliance.
- Dissolved silica analyses were in 44% contractual compliance.
- Total cyanide analyses were in 100% contractual compliance.
- Pesticides analyses were in 100% contractual compliance with the exception of beta-BHC.
- Herbicides analyses were in 100% contractual compliance.
- SVOCs analyses were in 100% contractual compliance with the exception of bis(2-ethylhexyl)phthalate.

Holding times were completed with 100% compliance. Contractual compliance for metals ranged from 4% to 100% due to MS/MSD percent recovery outliers, high field and laboratory duplicate RPDs, and method blank detection. Contractual compliance for VOCs ranged from 62% to 100% due to low MS percent recovery. Total phosphorus results were in 76% contractual compliance due to high field duplicate RPD. Dissolved silica results were in 44% contractual compliance due to low MS percent recovery and high field duplicate RPD. Beta-BHC results were in 92% contractual compliance due to dual column results RPD was greater than 40%. Bis(2-ethylhexyl)-phthalate results were in 85% contractual recovery due to rinsate interference.

## 4.6. Sensitivity

Sensitivity describes the relationship between the reporting limits and the project quality goals. This is important for project objectives as it eliminates the chance of an analyte being reported as “not detected” at a concentration that is greater than a regulatory guidance value. The reporting limits for all analytes in the soil samples were below the New Mexico Environmental Department’s Soil Screening Levels for residential sites. Therefore, reported results have been properly quantified for comparison to appropriate regulatory values.

## 5. Conclusions

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The data quality review indicated that QC protocols were met. Some data quality issues were observed related to method blank interference, rinsate interference, field duplicate and laboratory duplicate RPD outliers, and low MS/MSD percent recoveries. Overall, this data set is considered usable and meets the project data quality objectives.

# **Appendix E:**

## **Screening Level Ecological Risk Assessment**

### **- Phase I Scoping Assessment**



U.S. Army Corps of Engineers  
RCRA Facility Investigation Report  
Oro Grande Landfill (SWMU-25/FTBL-14)



**E**

## **ATTACHMENT A**

# **SCREENING-LEVEL ECOLOGICAL RISK ASSESSMENT SCOPING ASSESSMENT SITE ASSESSMENT CHECKLIST**

## INTRODUCTION

This checklist has been developed as a tool for gathering information about the facility property and surrounding areas, as part of the scoping assessment. Specifically, the checklist assists in the compilation of information on the physical and biological aspects of the site including the site environmental setting, usage of the site, releases at the site, contaminant fate and transport mechanisms, and the area's habitats, receptors, and exposure pathways. The completed checklist can then be used to construct the preliminary conceptual site exposure model (PCSEM) for the site. In addition, the checklist and PCSEM will serve as the basis for the scoping assessment report. Section III of this document provides further information on using the completed checklist to develop the PCSEM.

In general, the checklist is designed for applicability to all sites, however, there may be unusual circumstances which require professional judgment in order to determine the need for further ecological evaluation (*e.g.*, cave-dwelling receptors). In addition, some of the questions in the checklist may not be relevant to all sites. Some facilities may have large amounts of data available regarding contaminant concentrations and hydrogeologic conditions at the site, while other may have only limited data. In either case, the questions on the checklist should be addressed as completely as possible with the information available.

Habitats and receptors, which may be present at the site, can be identified by direct or indirect<sup>1</sup> observations and by contacting local and regional natural resource agencies. Habitat types may be determined by reviewing land use and land cover maps (LULC), which are available via the Internet at <http://www.nationalatlas.gov/mapit.html>. With regard to receptors, it should be noted that receptors are often present at a site even when they are not observed. Therefore, for the purposes of this checklist, it should be assumed that receptors are present if viable habitat is present. The presence of receptors should be confirmed by contacting one or several of the organizations listed below.

Sources of general information available for the identification of ecological receptors and habitats include:

- U.S. Fish and Wildlife Service (<http://www.fws.gov>)
- Biota Information System of New Mexico (BISON-M) maintained by the New Mexico Department of Game and Fish (NMGF) (<http://151.199.74.229/states/nm.htm>)
- U.S. Forest Service (USFS) (<http://www.fs.fed.us/>)
- New Mexico Forestry Division (NMFD) of the Energy, Minerals and Natural Resources Department (<http://www.emnrd.state.nm.us/forestry/index.htm>)
- U.S. Bureau of Land Management (USBLM) (<http://www.blm.gov/nhp/index.htm>) or ([http://www.nm.blm.gov/www/new\\_home\\_2.html](http://www.nm.blm.gov/www/new_home_2.html))
- United States Geological Service (USGS) (<http://www.usgs.gov>)

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<sup>1</sup> Examples of indirect observations that indicate the presence of receptors include: tracks, feathers, burrows, scat

- National Wetland Inventory Maps (<http://wetlands.fws.gov>)
- National Audubon Society (<http://www.audubon.com>)
- National Biological Information Infrastructure (<http://biology.usgs.gov>)
- Sierra Club (<http://www.sierraclub.org>)
- National Geographic Society (<http://www.nationalgeographic.com>)
- New Mexico Natural Heritage Program (<http://nrmnhp.unm.edu/>)
- State and National Parks System
- Local universities
- Tribal organizations

## **INSTRUCTIONS FOR COMPLETING THE CHECKLIST**

The checklist consists of four sections: Site Location, Site Characterization, Habitat Evaluation, and Exposure Pathway Evaluation. Answers to the checklist should reflect existing conditions and should not consider future remedial actions at the site. Completion of the checklist should provide sufficient information for the preparation of a PCSEM and scoping report and allow for the identification of any data gaps.

**Section I - Site Location**, provides general site information, which identifies the facility being evaluated, and gives specific location information. Site maps and diagrams, which should be attached to the completed checklist, are an important part of this section. The following elements should be clearly illustrated: 1) the location and boundaries of the site relative to the surrounding area, 2) any buildings, structures or important features of the facility or site, and 3) all ecological areas or habitats identified during completion of the checklist. It is possible that several maps will be needed to clearly and adequately illustrate the required elements. Although topographical information should be illustrated on at least one map, it is not required for every map. Simplified diagrams (preferably to scale) of the site and surrounding areas will usually suffice.

**Section II - Site Characterization**, is intended to provide additional temporal and contextual information about the site, which may have an impact on determining whether a certain area should be characterized as ecologically viable habitat or contains receptors. Answers to the questions in Section II will help the reviewer develop a broader and more complete evaluation of the ecological aspects of a site.

**Section III - Habitat Evaluation**, provides information regarding the physical and biological characteristics of the different habitat types present at or in the locality of the site. Aquatic features such as lakes, ponds, streams, arroyos and ephemeral waters can be identified by reviewing aerial photographs, LULC and topographic maps and during site reconnaissance visits. In New Mexico, there are several well-defined terrestrial communities, which occur naturally. Typical communities include wetlands, forest (e.g., mixed conifer, ponderosa pine and pinyon juniper), scrub/shrub, grassland, and desert. Specific types of vegetation characterize each of these communities and can be used to identify them. Field guides are often useful for identifying vegetation types. A number of sites may be in areas



that have been disturbed by human activities and may no longer match any of the naturally occurring communities typical of the southwest. Particularly at heavily used areas at facilities, the two most common of these areas are usually described as “weed fields” and “lawn grass”. Vegetation at “weed fields” should be examined to determine whether the weeds consist primarily of species native to the southwest or introduced species such as *Kochia*. Fields of native weeds and lawn grass are best evaluated using the short grass prairie habitat guides.

The applicable portions of Section III of the checklist should be completed for each individual habitat identified. For example, the questions in Section III.A of the checklist should be answered for each wetland area identified at or in the locality of the site and the individual areas must be identified on a map or maps.

**Section IV- Exposure Pathway Evaluation**, is used to determine if contaminants at the site have the potential to impact habitat identified in Section III. An exposure pathway is the course a chemical or physical agent takes from a source to an exposed organism. Each exposure pathway includes a source (or release from a source), an environmental transport mechanism, an exposure point, and an exposure route. A complete exposure pathway is one in which each of these components, as well as a receptor to be exposed, is present. Essentially, this section addresses the fate and transport of contaminants that are known or suspected to have been released at the site. In most cases, without a complete exposure pathway between contaminants and receptors, additional ecological evaluation is not warranted.

Potential transport pathways addressed in this checklist include migration of contaminants via air dispersion, leaching into groundwater, soil erosion/runoff, groundwater discharge to surface water, and irradiation. Due to New Mexico’s semi-arid climate, vegetation is generally sparse. The sparse vegetation, combined with the intense nature of summer storms in New Mexico, results in soil erosion that occurs sporadically over a very brief time frame. Soil erosion may be of particular concern for sites located in steeply sloped areas. Several questions within Section IV of this checklist have been developed to aid in the identification of those sites where soil erosion/runoff would be an important transport mechanism.

## **USING THE CHECKLIST TO DEVELOP THE PRELIMINARY CONCEPTUAL SITE EXPOSURE MODEL**

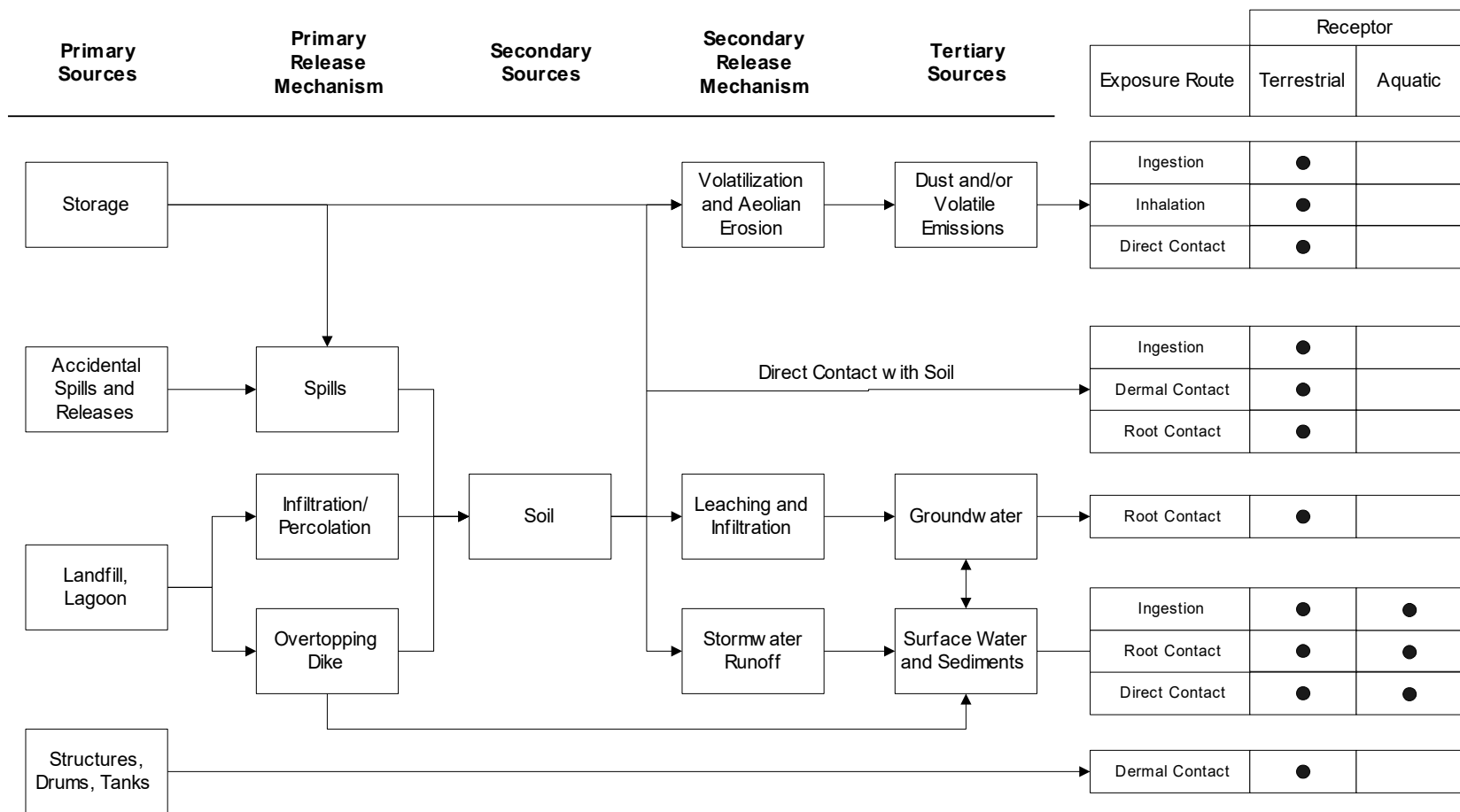
The completed Site Assessment Checklist can be used to construct the PCSEM. An example PCSEM diagram is presented in Figure 1. The CSM illustrates actual and potential contaminant migration and exposure pathways to associated receptors. The components of a complete exposure pathway are simplified and grouped into three main categories: sources, release mechanisms, and potential receptors. As a contaminant migrates and/or is transformed in the environment, sources and release mechanisms may expand into primary, secondary, and tertiary levels. For example, Figure 1 illustrates releases from inactive lagoons (primary sources) through spills (primary release mechanism), which migrate to surface and subsurface soils (secondary sources), which are then leached (secondary release mechanism) to groundwater (tertiary source). Similarly, exposures of various trophic levels

to the contaminant(s) and consequent exposures via the food chain may lead to multiple groups of receptors. For example, Figure 1 illustrates groups of both aquatic and terrestrial receptors which may be exposed and subsequently serve as tertiary release mechanisms to receptors which prey on them.

Although completing the checklist will not provide the user with a readymade PCSEM, a majority of the components of the PCSEM can be found in the answers to the checklist. It is then up to the user to put the pieces together into a comprehensive whole. The answers from Section II of the checklist, Site Characterization, can be used to identify sources of releases. The answers to Section IV, Exposure Pathway Evaluation, will assist users in tracing the migration pathways of releases in the environment, thus helping to identify release mechanisms and sources. The results of Section III, Habitat Evaluation, can be used to both identify secondary and tertiary sources and to identify the types of receptors which may be exposed. Appendix B of the NMED's *Guidance for Assessing Ecological Risks Posed by Chemicals: Screening-Level Ecological Assessment* also contains sample food webs which may be used to develop the PCSEM.

Once all of the components have been identified, one can begin tracing the steps between the primary releases and the potential receptors. For each potential receptor, the user should consider all possible exposure points (e.g., prey items, direct contact with contaminated soil or water, etc.) then begin eliminating pathways, which are not expected to result in exposure to the contaminant at the site. Gradually, the links between the releases and receptors can be filled in, resulting in potential complete exposure pathways.

For further guidance on constructing a PCSEM, consult the NMED's *Guidance for Assessing Ecological Risks Posed by Chemicals: Screening-Level Ecological Assessment* (2000), and EPA's Office of Solid Waste and Emergency Response's *Soil Screening Guidance: User's Guide* (1996).



**Figure 1. Example Preliminary Conceptual Site Exposure Model Diagram**

**NEW MEXICO ENVIRONMENT DEPARTMENT  
SITE ASSESSMENT CHECKLIST**

**I. SITE LOCATION**

1. Site Name: Oro Grande Landfill  
US EPA I.D. Number: NM4213720101-01  
Location: 0.8 miles southeast of the Oro Grande Range Camp at the southwest edge of Elephant Mountain (See Figure 1)  
County: Otero County  
City: Oro Grande Range Camp State: New Mexico
2. Latitude: 32.391593 Longitude: 106.1511301
3. Attach site maps, including a topographical map, a diagram which illustrates the layout of the facility (e.g., site boundaries, structures, etc.), and maps showing all habitat areas identified in Section III of the checklist. Also, include maps which illustrate known release areas, sampling locations, and any other important features, if available.

**II. SITE CHARACTERIZATION**

1. Indicate the approximate area of the site (i.e., acres or sq. ft)  
The area of the landfill covers approximately two acres and was reported to contain a single trench approximately 330 feet long by 50 feet wide (See Figure 2)
2. Provide an approximate breakdown of the land uses on the site:  

_____ % Heavy Industrial	_____ % Light Industrial	_____ % Urban
_____ % Residential	_____ % Rural	_____ % Agricultural <sup>b</sup>
_____ % Recreational <sup>a</sup>	_____ % Undisturbed	100 % Other <sup>c</sup>

<sup>a</sup>For recreational areas, please describe the usage of the area (e.g., park, playing field, etc.): Not a recreational area.

<sup>b</sup>For agricultural areas, please list the crops and/or livestock which are present:  
Not an agricultural area.

<sup>c</sup>For areas designated as "other", please describe the usage of the area:  
The Site is part of the Oro Grande Range Camp on the Fort Bliss Military Reservation

3. Provide an approximate breakdown of the land uses in the area surrounding the site. Indicate the radius (in miles) of the area described: \_\_\_\_\_

_____ % Heavy Industrial	_____ % Light Industrial	_____ % Urban
_____ % Residential	_____ % Rural	_____ % Agricultural <sup>b</sup>
_____ % Recreational <sup>a</sup>	_____ % Undisturbed	<u>100</u> % Other <sup>c</sup>

<sup>a</sup>For recreational areas, please describe the usage of the area (e.g., park, playing field, golf course, etc.): Not a recreational area.

<sup>b</sup>For agricultural areas, please list the crops and/or livestock which are present: Not an agricultural area.

<sup>c</sup>For areas designated as "other", please describe the usage of the area: Fort Bliss is a multi-mission United States (U.S.) Army installation located on approximately 1.12 million acres in Texas and New Mexico.

4. Describe reasonable and likely future land and/or water use(s) at the site. In April 2002, the Deputy Chief of Staff of the Army for Operations and Plans announced the decision to proceed with the proposed 30-year, phased implementation of Army Transformation for Fort Bliss. In total, the Army Transformation and Base Closure and Realignment (BRAC) changes at Fort Bliss will result in a net increase of approximately 20,000 military personnel and 2,700 Government civilian personnel, 1,440 tracked vehicles, 3,600 wheeled vehicles, and 110 helicopters at Fort Bliss. Fort Bliss will remain an Army installation for the foreseeable future.
5. Describe the historical uses of the site. Include information on chemical releases that may have occurred as a result of previous land uses. For each chemical release, provide information on the form of the chemical released (i.e., solid, liquid, vapor) and the known or suspected causes or mechanism of the release (i.e., spills, leaks, material disposal, dumping, explosion, etc.). The landfill was constructed in 1964 to provide a waste disposal facility to service the Oro Grande Range Camp. The landfill reportedly contained approximately 600 cubic yards of waste material when it was closed in 1994. Based on the trench excavations conducted in February 2008, by Malcolm Pirnie, items disposed of at the landfill include: field communications wire, electrical wire, razor wire, car parts, construction materials, styrofoam, plastic sheeting, plastic netting, garbage bags, PVC pipe, concrete, plant debris, asphalt, tar paper, metal items, glass bottles, ceramic fragments, and household refuse. The Oro Grande Landfill was excavated out of native soil, unlined, and capped with native soil. The objectives of the investigation were to verify the lateral extent of the wastes, determine whether chemicals of concern have been released to the soil at concentrations above the SSLs-Residential levels, evaluate the potential for a groundwater pathway, and determine the characteristics of the on-site soils for use as landfill cover material.
6. If any movement of soil has taken place at the site, describe the degree of the disturbance. Indicate the likely source of any disturbances (e.g., erosion, agricultural, mining, industrial activities, removals, etc.) and estimate when these events occurred. The site has not been utilized since 1994., No mechanical soil movement has occurred until the

February 2008 soil investigation activities (exploratory trenches, geophysical samples, and soil samples). The annual precipitation at Fort Bliss averages 8 to 10 inches on the site and the site has a low relief, so little to no erosion takes place. In addition, the landfill is paralleled on the east and west side by two naturally formed arroyos that prevent surface flow from entering the site.

7. Describe the current uses of the site. Include information on recent (previous 5 years) disturbances or chemical releases that have occurred. For each chemical release, provide information on the form of the chemical released and the causes or mechanism of the release.

As discussed above, the landfill commenced operation around 1964 and was closed in 1994. No releases or dumping in the Oro Grande Landfill have occurred within the last 14 years. COCs at the site are potentially due to the disposal of refuse placed within the landfill, prior to 1994; however, the past investigations indicated that no chemical releases have occurred at the Oro Grande Landfill.

8. Identify the location or suspected location of chemical releases at the site. Provide an estimate of the distance between these locations and the areas identified in Section III.

The disposal of refuse from within the Oro Grande Landfill may have been a source for releases. Fifteen exploratory trenches were conducted to verify the maximum extent of waste and to determine the cover depth over the refuse. The area of the refuse cell was determined to be 0.039 acres and the cover depth ranged from 2 feet – 10 feet below ground surface (bgs). The identified refuse boundary is located approximately 50 feet from the arroyo located on the west side of the landfill and approximately 70 feet from the arroyo located on the east side of the landfill. Because the landfill was closed in 1994 the landfill has re-vegetated with creosote bush and low shrub snakeweed (See section III.C.4 for more details on the vegetation).

9. Identify the suspected contaminants of concern (COCs) at the site. If known, include the maximum contaminant levels. Please indicate the source of data cited (e.g., RFI, confirmatory sampling, etc.).

In February 2008, Malcolm Pirnie completed an additional nine soil borings (FT14-SB-1 to FT14-SB-9) to collect soil samples. Three subsurface soil samples were collected from borings FT14-SB-1 through FT14-SB-6. The shallowest sample interval was used to assess the COCs in the surface soil. The second sample interval was used to assess COCs below the extent of waste. The third sample interval was used to determine if vertical migration of the COCs has occurred. Soil samples at the former tar area were collected at depth intervals of 0-1 feet bgs from FT14-SB-7 and FT14-SB-8. The 0-1 foot sample interval was used to determine if the tar material has released constituents at the surface. A total of twenty-one soil samples were collected from the Oro Grande Landfill area. Additionally, three QC field duplicate soil samples, two rinsate samples, two samples of investigation derived waste (IDW), and eight trip blanks were collected during the sampling event. The twenty-one soil samples and three QA/QC duplicate samples were analyzed for volatile organic compounds (VOCs), polychlorinated biphenyls (PCBs), and inorganics. Additionally, eight of the samples were analyzed for organochlorine pesticides and chlorinated herbicides, ten samples were analyzed for semivolatile organic compounds (SVOCs), and fourteen samples were analyzed for total petroleum hydrocarbons (TPH). The three QA/QC samples and

the rinsate and investigation-derived wastes (IDW) samples were analyzed for VOCs, SVOCs, PCBs, TPH, inorganics, pesticides, and herbicides.

A review of the analytical results from the investigation indicated that concentrations of VOCs, SVOCs, PCBs, TPH, organochlorine pesticides, and chlorinated herbicides were below the NMED SSL-Residential. The review indicated that the detected concentrations of inorganic chemicals were below the NMED SSL-Residential and the USEPA Region 6 Residential SLs, except for arsenic which was detected at a concentration of 4.01 mg/kg in the subsurface soil sample collected from boring F14-SB-5 at the 28-30 foot depth interval. While the detected arsenic concentration was above the NMED SSL-Residential and the USEPA Residential SL, it was below the USEPA Region 6 background concentration.

The soil boring locations are indicated in Figure 3. A summary of detections for the subsurface soils is presented in Table 1 and 2.

10. Identify the media (e.g., soil (surface or subsurface), surface water, air, groundwater) which are known or suspected to contain COCs. Subsurface Soil
11. Indicate the approximate depth to groundwater (in feet below ground surface [(bgs)]). The depth to the regional aquifer is expected to be greater than 350 feet bgs in igneous bedrock (Tetra Tech, 1998). Saturated conditions were not encountered during the drilling of FT14-SB-6 to 116.5 feet bgs.
12. Indicate the direction of groundwater flow (e.g., north, southeast, etc.) Groundwater in the Tularosa Basin generally flows to the south (Tetra Tech 1998).

### III. HABITAT EVALUATION

#### III.A Wetland Habitats

Are any wetland<sup>2</sup> areas such as marshes or swamps on or adjacent to the site?

☐ Yes      ☒ No

If yes, indicate the wetland area on the attached site map and answer the following questions regarding the wetland area. If more than one wetland area is present on or adjacent to the site, make additional copies of the following questions and fill out for each individual wetland area. Distinguish between wetland areas by using names or other designations (such as location), and clearly identify each area on the site map. Also, obtain and attach a National Wetlands Inventory Map (or maps) to illustrate each wetland area.

Identify the sources of the observations and information (e.g., National Wetland Inventory, Federal or State Agency, USGS topographic maps) used to make the determination that wetland areas are or are not present.

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If no wetland areas are present, proceed to Section III.B.

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<sup>2</sup>Wetlands are defined in 40 CFR §232.2 as “ Areas inundated or saturated by surface or groundwater at a frequency and duration sufficient to support, and that under normal circumstances does support, a prevalence of vegetation typically adapted for life in saturated soil conditions.” Examples of typical wetlands plants include: cattails, cordgrass, willows and cypress trees. National wetland inventory maps may be available at <http://nwi.fws.gov>. Additional information on wetland delineation criteria is also available from the Army Corps of Engineers.



### Wetland Area Questions

☐ Onsite      ☐ Offsite

Name or  
Designation: \_\_\_\_\_

1. Indicate the approximate area of the wetland (acres or ft<sup>2</sup>) \_\_\_\_\_

2. Identify the type(s) of vegetation present in the wetland.

- ☐ Submergent (i.e., underwater) vegetation
- ☐ Emergent (i.e., rooted in the water, but rising above it) vegetation
- ☐ Floating vegetation
- ☐ Scrub/shrub
- ☐ Wooded
- ☐ Other (Please describe): \_\_\_\_\_

3. Estimate the vegetation density of the wetland area.

- ☐ Dense (i.e., greater than 75% vegetation)
- ☐ Moderate (i.e., 25% to 75% vegetation)
- ☐ Sparse (i.e., less than 25% vegetation)

4. Is standing water present? ☐ Yes ☐ No

If yes, is the water primarily: ☐ Fresh or ☐ Brackish

Indicate the approximate area of the standing water (ft<sup>2</sup>): \_\_\_\_\_

Indicate the approximate depth of the standing water, if known (ft. or in.) \_\_\_\_\_

5. If known, indicate the source of the water in the wetland.

- ☐ Stream/River/Creek/Lake/Pond
- ☐ Flooding
- ☐ Groundwater
- ☐ Surface runoff

6. Is there a discharge from the facility to the wetland? ☐ Yes ☐ No

If yes, please

describe: \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

### Wetland Area Questions (Continued)

7. Is there a discharge from the wetland? ☐ Yes ☐ No  
If yes, indicate the type of aquatic feature the wetland discharges into:

- ☐ Surface stream/River (Name: \_\_\_\_\_)
- ☐ Lake/Pond (Name: \_\_\_\_\_)
- ☐ Groundwater
- ☐ Not sure

8. Does the area show evidence of flooding? ☐ Yes ☐ No  
If yes, indicate which of the following are present (mark all that apply):

- ☐ Standing water
- ☐ Water-saturated soils
- ☐ Water marks
- ☐ Buttressing
- ☐ Debris lines
- ☐ Mud cracks
- ☐ Other (Please describe): \_\_\_\_\_

9. Animals observed in the wetland area or suspected to be present based on indirect evidence or file material:

- ☐ Birds
- ☐ Fish
- ☐ Mammals
- ☐ Reptiles (e.g., snakes, turtles)
- ☐ Amphibians (e.g., frogs, salamanders)
- ☐ Sediment-dwelling invertebrates (e.g., mussels, crayfish, insect nymphs)

Specify species, if known:

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### III.B Aquatic Habitats

#### III.B.1 Non-Flowing Aquatic Features

Are any non-flowing aquatic features (such as ponds or lakes) located at or adjacent to the site?

☐ Yes    ☒ No

If yes, indicate the aquatic feature on the attached site map and answer the following questions regarding the non-flowing aquatic features. If more than one non-flowing aquatic feature is present on or adjacent to the site, make additional copies of the following questions and fill out for each individual aquatic feature. Distinguish between aquatic features by using names or other designations, and clearly identify each area on the site map.

If no, proceed to Section III.B.2.

#### Non-Flowing Aquatic Feature Questions

☐ Onsite    ☐ Offsite

Name or Designation: \_\_\_\_\_

1. Indicate the type of aquatic feature present:

- ☐ Natural (e.g., pond or lake)
- ☐ Man-made (e.g., impoundment, lagoon, canal, etc.)

2. Estimate the approximate size of the water body (in acres or sq. ft.) \_\_\_\_\_

3. If known, indicate the depth of the water body (in ft. or in.). \_\_\_\_\_

### Non-Flowing Aquatic Feature Questions (Continued)

4. Indicate the general composition of the bottom substrate. Mark all sources that apply from the following list.

<input type="checkbox"/> Bedrock	<input type="checkbox"/> Sand	<input type="checkbox"/> Concrete
<input type="checkbox"/> Boulder (>10 in.)	<input type="checkbox"/> Silt	<input type="checkbox"/> Debris
<input type="checkbox"/> Cobble (2.5 - 10 in.)	<input type="checkbox"/> Clay	<input type="checkbox"/> Detritus
<input type="checkbox"/> Gravel (0.1 - 2.5 in.)	<input type="checkbox"/> Muck (fine/black)	
<input type="checkbox"/> Other (please specify): _____		

5. Indicate the source(s) of the water in the aquatic feature. Mark all sources that apply from the following list.

☐ River/Stream/Creek  
☐ Groundwater  
☐ Industrial Discharge  
☐ Surface Runoff  
☐ Other (please specify): \_\_\_\_\_

6. Is there a discharge from the facility to the aquatic feature? ☐ Yes ☐ No

If yes, describe the origin of each discharge and its migration path:

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

7. Does the aquatic feature discharge to the surrounding environment? ☐ Yes ☐ No

If yes, indicate the features from the following list into which the aquatic feature discharges, and indicate whether the discharge occurs onsite or offsite:

<input type="checkbox"/> River/Stream/Creek	<input type="checkbox"/> onsite <input type="checkbox"/> offsite
<input type="checkbox"/> Groundwater	<input type="checkbox"/> onsite <input type="checkbox"/> offsite
<input type="checkbox"/> Wetland	<input type="checkbox"/> onsite <input type="checkbox"/> offsite
<input type="checkbox"/> Impoundment	<input type="checkbox"/> onsite <input type="checkbox"/> offsite
<input type="checkbox"/> Other (please describe) _____	

**Non-Flowing Aquatic Feature Questions (Continued)**

8. Animals observed in the vicinity of the aquatic feature or suspected to be present based on indirect evidence or file material:

- ☐ Birds
- ☐ Fish
- ☐ Mammals
- ☐ Reptiles (e.g., snakes, turtles)
- ☐ Amphibians (e.g., frogs, salamanders)
- ☐ Sediment-dwelling invertebrates (e.g., mussels, crayfish, insect nymphs)

Specify species, if known:

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### III.B.2 Flowing Aquatic Features

Are any flowing aquatic features (such as streams or rivers) located at or adjacent to the site?

☒ Yes    ☐ No

If yes, indicate the aquatic feature on the attached site map and answer the following questions regarding the flowing aquatic features. If more than one flowing aquatic feature is present on or adjacent to the site, make additional copies of the following questions and fill out for each individual aquatic feature. Distinguish between aquatic features by using names or other designations, and clearly identify each area on the site map

If no, proceed to Section III.C.

## Flowing Aquatic Feature Questions

☐ Onsite      **X** Offsite

Name or Designation: The site is bordered on the east and west side by two arroyos.

1. Indicate the type of flowing aquatic feature present.

- ☐ River
- ☐ Stream
- ☐ Creek
- ☐ Brook
- ☐ Dry wash
- X** **Arroyo**
- ☐ Intermittent stream
- ☐ Artificially created (ditch, etc.)
- ☐ Other (specify)
- ☐

2. Indicate the general composition of the bottom substrate.

- |  |  |                                   |
|--|--|-----------------------------------|
| <input type="checkbox"/> Bedrock                       | <b>X</b> Sand                              | <input type="checkbox"/> Concrete |
| <input type="checkbox"/> Boulder (>10 in.)             | <input type="checkbox"/> Silt              | <input type="checkbox"/> Debris   |
| <input type="checkbox"/> Cobble (2.5 - 10 in.)         | <input type="checkbox"/> Clay              | <input type="checkbox"/> Detritus |
| <b>X</b> Gravel (0.1 - 2.5 in.)                        | <input type="checkbox"/> Muck (fine/black) |                                   |
| <input type="checkbox"/> Other (please specify): _____ |  |                                   |

3. Describe the condition of the bank (e.g., height, slope, extent of vegetative cover) of the aquatic feature.

The banks of the two arroyos are approximately 1 to 3 feet tall with 20 to 40 percent slopes. The vegetation within and adjacent to the arroyos is slightly more diverse and 50 percent taller than the upland desert vegetation. The percent of bare ground in the arroyos is approximately 40 percent versus 55 percent on the upland site.

4. Is there a discharge from the facility to the aquatic feature? ☐ Yes      **X** No

If yes, describe the origin of each discharge and its migration path:

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5. Indicate the discharge point of the water body. Specify name, if known.

The two arroyos converge approximately 450 feet south of the landfill and continue in a southeasterly direction until it intersects with U.S. Highway 54. The majority of arroyo-riparian drainages on Fort Bliss do not qualify as jurisdictional wetlands as defined by the U.S. Army Corps of Engineers (Lickvar and Sprecher, 1997).

### Flowing Aquatic Feature Questions (Continued)

6. If the flowing aquatic feature is a dry wash or arroyo, answer the following questions.
- ☐ Check here if feature is not a dry wash or arroyo
  - If known, specify the average number of days in a year in which flowing water is present in the feature: \_\_\_\_\_
  - Is standing water or mud present? Check all that apply.
    - ☐ Standing water
    - ☐ Mud
    - ☒ Neither standing water or mud
  - Does the area show evidence of recent flow (e.g., flood debris clinging to vegetation)?
    - ☐ Yes
    - ☒ No
    - ☐ Not sure
7. Animals observed in the vicinity of the aquatic feature or suspected to be present based on indirect evidence or file material:
- ☒ Birds
  - ☐ Fish
  - ☒ Mammals
  - ☒ Reptiles (e.g., snakes, turtles)
  - ☐ Amphibians (e.g., frogs, salamanders)
  - ☐ Sediment-dwelling invertebrates (e.g., mussels, crayfish, insect nymphs)

Specify species, if known:

Studies on Fort Bliss have demonstrated that arroyo-riparian drainage areas are used more extensively by wildlife than adjacent upland areas (US Army, 2001). Malcolm Pirnie conducted an ecological assessment of the Oro Grande Landfill and the adjacent areas on February 11 and 12, 2008. The landfill and surrounding areas was identified as Chihuahuan desert scrub dominated by creosote bush and low shrub snakeweed. Due to the small size of arroyos and close proximity (60-ft) to the Landfill the list of the species that have the potential to be present, based on surveys completed (by the US army) in the area, is included in Section III C.4. In addition, the list of identified vegetation and observed species in the vicinity to the landfill is identical to the vegetation and observed species on the Landfill so they are also included in Section III C. 4.



### **III.C Terrestrial Habitats**

#### **III.C.1 Wooded**

Are any wooded areas on or adjacent to the site? ☐ Yes ☒ No

If yes, indicate the wooded area on the attached site map and answer the following questions. If more than one wooded area is present on or adjacent to the site, make additional copies of the following questions and fill out for each individual wooded area. Distinguish between wooded areas by using names or other designations, and clearly identify each area on the site map.

If no, proceed to Section III.C.2.

### Wooded Area Questions

☐ On-site    ☐ Off-site

Name or Designation: \_\_\_\_\_

1. Estimate the approximate size of the wooded area (in acres or sq. ft.) \_\_\_\_\_

2. Indicate the dominant type of vegetation in the wooded area.

- ☐ Evergreen
- ☐ Deciduous
- ☐ Mixed

Dominant plant species, if known: \_\_\_\_\_

3. Estimate the vegetation density of the wooded area.

- ☐ Dense (i.e., greater than 75% vegetation)
- ☐ Moderate (i.e., 25% to 75% vegetation)
- ☐ Sparse (i.e., less than 25% vegetation)

4. Indicate the predominant size of the trees at the site. Use diameter at chest height.

- ☐ 0-6 inches
- ☐ 6-12 inches
- ☐ >12 inches
- ☐ No single size range is predominant

5. Animals observed in the wooded area or suspected to be present based on indirect evidence or file material:

- ☐ Birds
- ☐ Mammals
- ☐ Reptiles (e.g., snakes, lizards)
- ☐ Amphibians (e.g., toads, salamanders)

Specify species, if known:

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### III.C.2      Shrub/Scrub

Are any shrub/scrub areas on or adjacent to the site?   ☐ Yes    **X** No

If yes, indicate the shrub/scrub area on the attached site map and answer the following questions. If more than one shrub/scrub area is present on or adjacent to the site, make additional copies of the following questions and fill out for each individual shrub/scrub area. Distinguish between shrub/scrub areas, using names or other designations, and clearly identify each area on the site map.

If no, proceed to Section III.C.3.

### Shrub/Scrub Area Questions

☐ Onsite      ☐ Offsite

Name or Designation: \_\_\_\_\_

1. Estimate the approximate size of the shrub/scrub area (in acres or sq. ft.). \_\_\_\_\_
2. Indicate the dominant type of shrub/scrub vegetation present, if known.  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_
3. Estimate the vegetation density of the shrub/scrub area.
  - ☐ Dense (i.e., greater than 75% vegetation)
  - ☐ Moderate (i.e., 25% to 75% vegetation)
  - ☐ Sparse (i.e., less than 25% vegetation)
4. Indicate the approximate average height of the scrub/shrub vegetation.
  - ☐ 0-2 feet
  - ☐ 2-5 feet
  - ☐ >5 feet
5. Animals observed in the shrub/scrub area or suspected to be present based on indirect evidence or file material:
  - ☐ Birds
  - ☐ Mammals
  - ☐ Reptiles (e.g., snakes, lizards)
  - ☐ Amphibians (e.g., toads, salamanders)

Specify species, if known:

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### III.C.3 Grassland

Are any grassland areas on or adjacent to the site? ☐ Yes ☒ No

If yes, indicate the grassland area on the attached site map and answer the following questions. If more than one grassland area is present on or adjacent to the site, make additional copies of the following questions and fill out for each individual grassland area. Distinguish between grassland areas by using names or other designations, and clearly identify each area on the site map.

If no, proceed to Section III.C.4.

#### Grassland Area Questions

☐ Onsite ☐ Offsite

Name or Designation: \_\_\_\_\_

1. Estimate the approximate size of the grassland area (in acres or sq. ft.). \_\_\_\_\_
2. Indicate the dominant plant type, if known.  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_
3. Estimate the vegetation density of the grassland area.
  - ☐ Dense (i.e., greater than 75% vegetation)
  - ☐ Moderate (i.e., 25% to 75% vegetation)
  - ☐ Sparse (i.e., less than 25% vegetation)
4. Indicate the approximate average height of the dominant plant type (in ft. or in.)\_
5. Animals observed in the grassland area or suspected to be present based on indirect evidence or file material:
  - ☐ Birds
  - ☐ Mammals
  - ☐ Reptiles (e.g., snakes, lizards)
  - ☐ Amphibians (e.g., toads, salamanders)

Specify species, if known:

### III.C.4 Desert

Are any desert areas on or adjacent to the site? ☒ Yes ☐ No

If yes, indicate the desert area on the attached site map and answer the following questions. If more than one desert area is present on or adjacent to the site, make additional copies of the following questions and fill out for each individual desert area. Distinguish between desert areas by using names or other designations, and clearly identify each area on the site map.

If no, proceed to Section III.C.5.

#### Desert Area Questions

☒ Onsite ☐ Offsite

Name or Designation: Northern Chihuahuan Desert

1. Estimate the approximate size of the desert area (in acres or sq. ft.). 1,200,000 acres of Fort Bliss
2. Describe the desert area (e.g., presence or absence of vegetation, vegetation types, presence/size of rocks, sand, etc.)

Soils throughout the landfill area are of the Pendero fine sand type (SSURGO 2006). The Pendero series is described as a reddish brown loamy fine sand and is eolian in origin. The soil is described as having 2 to 5 percent slopes. Pendero soils are excessively drained and have low water capacity (USDA, 2007). Malcolm Pirnie conducted an ecological assessment of the Oro Grande Landfill and the adjacent areas on February 11 and 12, 2008. Enclosed is a photographic log from the ecological assessment. The landfill and surrounding areas was identified as Chihuahuan desert scrub dominated by creosote bush and low shrub snakeweed. The following is a list of dominant vegetation that were observed in the vicinity of the landfill:

Creosote bush (Larrea tridentate), Snakeweed (Gutierrezia sarothrae), Desert grass (Blepharidachne bigelovii), Sagebrush (Artemisia filifolia), Tar bush (Flourensia cernva), Drop seed (Sporobolus flexuosus), Cat claw (Acacia greggie), Blue grama (Bouteloua gracilis), Mormon tea (Ephedra trifura), Hairy tridens (Erioneuron pilosum), Four-winged saltbush (Atriplex canescens), and Dagger (Yucca treculeana).

3. Animals observed in the desert area or suspected to be present based on indirect evidence or file material:

☒ Birds  
☒ Mammals  
☒ Reptiles (e.g., snakes, lizards)  
☐ Amphibians (e.g., toads, salamanders)

Specify species, if known:

Surveys for amphibians and reptiles were conducted in the Tularosa Basin on McGregor Range (located east of highway 54 southeast of Oro Grande Range) in 1996 and 1997. Based on these surveys and other information, 8 species of amphibians and 47 species of reptiles have been observed on Fort Bliss; an additional 11 species of amphibians and reptiles have the potential to occur. During the surveys, it was determined that the box turtle (*Terrapene ornata*) is the only species of turtle observed on Fort Bliss. The most diverse group of reptiles is the lizards; 24 species have been recorded from Fort Bliss including 6 species of whiptails (Hartsough and Burkett, 2005; US Army, 2001)). The striped whiptail (*Aspidoscelis moinata*) was commonly found during the 2003-2005 herpetofauna surveys (Hartsough and Burkett, 2005). Twenty-two species of snakes are known to occur on Fort Bliss. Species such as the western diamondback rattlesnake (*Crotalus atrox*) and bull snake (*Pituophis catenifer sayi*) are common and widespread throughout Fort Bliss

A total of 334 species of birds have been recorded on Fort Bliss. Fort Bliss falls within the Chihuahuan desert and Mesa and Plain Physiographic Partners in Flight Region. Eighty species occur throughout the year, 129 species are seen only temporally during migration, 42 species are spring and summer residents, and the remaining species occur principally during the winter (Kozma and Mathews, 1997). Raptor surveys revealed that the Swainson's hawk (*Buteo swainsonii*) and turkey vulture (*Cathartes aura*) were the most common raptors observed (US Army, 2001). Winter surveys showed that the golden eagle and red-tailed hawk were the most common wintering species (Pidgeon and Mathews, 1996).

A total of 58 species of mammals have been documented and an additional 20 species have the potential to occur on Fort Bliss. Studies of rodents in arroyos and associated adjacent upland habitats found the relative abundance was greater in the arroyos than the adjacent uplands. In the 1997 surveys, the most abundant species were the silky pocket mouse (*Perognathus flavus*) and Merriam's kangaroo rat (*Dipodomys merriami*). Other common species were the deer mouse (*Peromyscus maniculatus*), hispid cotton rat (*Sigmodon hispidus*), white-footed mouse (*Peromyscus leucopus*), cactus mouse (*Peromyscus eremicus*), western harvest mouse (*Reithrodontomys megalotis*), and Ord's kangaroo rat (*Dipodomys ordii*). The deer and cactus mice were most common in the acacia scrub habitat while the white-footed mouse, hispid cotton rat, and western harvest mouse were most common in swales. Other rodents observed were the Texas antelope squirrel (*Ammospermophilus interpres*), rock squirrel (*Spermophilus variegatus*), Botta's pocket gopher (*Thomomys bottae*), and yellow-faced pocket gopher (*Cratogeomys castanops*) (Clary, et al, 2002). In addition, the porcupine (*Erethizon orsatum*), coyote (*Canis latrans*), badger (*Taxidea taxus*), and bobcat (*Lynx rufus*) were observed on Fort Bliss (US Army 2001).

Malcolm Pirnie conducted an ecological assessment of the Oro Grande Landfill and the adjacent areas on February 11 and 12, 2008. The landfill and surrounding areas was identified as Chihuahuan desert scrub dominated by creosote bush and low shrub snakeweed. The following is a list of animal species that were observed in the vicinity of the landfill:

- Invertebrate
  - Desert termites (*Atnitermes* sp.) and
  - Seed harvester ants (*Pogonomyrmex* sp.).

- **Mammals**
  - Desert cottontail (*Sylvilagus audubonii*) and
  - Black-tailed jackrabbits (*Lepus californicus*).
- **Bird**
  - Red-tailed hawks (*Buteo jamaicensis*);
  - Morning dove (*Zenaida macroura*); and
  - Scaled quail (*Callipepla squamata*).
- **Reptiles**
  - Western whiptail (*Cnemidophorus tigris*) and
  - Spiny lizard (*Sceloporus sp.*).



### III.C.5 Other

1. Are there any other terrestrial communities or habitats on or adjacent to the site which were not previously described?

☐ Yes ☒ No

If yes, indicate the “other” area(s) on the attached site map and describe the area(s) below. Distinguish between onsite and offsite areas. If no, proceed to Section III.D.

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### III.D Sensitive Environments and Receptors

1. Do any other potentially sensitive environmental areas<sup>3</sup> exist adjacent to or within 0.5 miles of the site? If yes, list these areas and provide the source(s) of information used to identify sensitive areas. *Do not answer “no” without confirmation from the U.S. Fish and Wildlife Service and appropriate State of New Mexico division.*  
No other environmental areas are located within 0.5 miles of the site. Consultation letters were sent to the United States Fish and Wildlife Service, and the New Mexico Department of Game and Fish. The consultation letters are provided in Appendix E.

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<sup>3</sup> Areas that provide unique and often protected habitat for wildlife species. These areas are typically used during critical life stages such as breeding, hatching, rearing of young and overwintering. Refer to **Table 1** at the end of this document for examples of sensitive environments.

2. Are any areas on or near (i.e., within 0.5 miles) the site which are owned or used by local tribes? If yes, describe. *Contact the Tribal Liason in the Office of the Secretary (505)827-2855 to obtain this information. The current and future surrounding land use is a military range. No unauthorized human use of the landfill and the Oro Grande Range is allowed*
  
4. Does the site serve or potentially serve as a habitat, foraging area, or refuge by rare, threatened, endangered, candidate and/or proposed species (plants or animals), or any otherwise protected species? If yes, identify species. *This information should be obtained from the U.S. Fish and Wildlife Service and appropriate State of New Mexico division. Of the 61 sensitive species, 45 are federally listed. However, only nine species are federally listed as threatened, endangered, or candidate status. Of these nine species, only two regularly occur on Fort Bliss: the Sneed pincushion cactus (*Coryphantha sneedii* var. *sneedii*) whose populations exist on specific limestone habitats and bald eagles (*Haliaeetus leucocephalus*) that roost on winter slopes in Lincoln National Forest and forage on the Sacramento Mountains foothills which is part of Fort Bliss. The northern aplomado falcon (*Falco femoralis septentrionalis*) has been observed on Fort Bliss, but only occasionally as transients. There have been no documented nesting attempts by the northern aplomado falcon since the early 1900s, despite many surveys. The remaining six species: Kuenzler's hedgehog cactus (*Echinocereus fendleri* var. *kuenzleri*), interior least tern (*Sterna antillarum athalasos*), yellow-billed cuckoo (*Coccyzus americanus*), southwest willow flycatcher (*Empidonax trailii extimus*), piping plover (*Charadrius melodus*), and Mexican spotted owl (*Strix occidentalis lucida*), are not known to occur. These six species have no suitable habitat or insufficient habitat to maintain a population or exist as rare, transitory, or seasonal migrants. Breeding is not known to occur on Fort Bliss (USACE, 2007). In addition, consultation letters were sent to the United States Fish and Wildlife Service, and the New Mexico Department of Game and Fish. The consultation letters are provided in Appendix E.*
  
5. Is the site potentially used as a breeding, roosting or feeding area by migratory bird species? If yes, identify which species. *The site has a low potential to be used as a breeding, roosting or feeding area due to the lack of water and suitable protective cover and habitat.*
  
6. Is the site used by any ecologically<sup>4</sup>, recreationally, or commercially important species? If yes, explain. *No, the site is not used by any ecologically, recreationally, or commercially important*

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4 Ecologically important species include populations of species which provide a critical (i.e., not replaceable) food resource for higher organisms and whose function as such would not be replaced by more tolerant species; or perform a critical ecological function (such as organic matter decomposition) and whose functions will not be replaced by other species. Ecologically important species include pest and opportunistic species that populate an area if they serve as a food source for other species, but do not include domesticated animals (e.g., pets and livestock) or plants/animals whose existence is maintained by continuous human interventions (e.g., fish hatcheries, agricultural crops, etc.,)

species.

#### IV. EXPOSURE PATHWAY EVALUATION

1. Do existing data provide sufficient information on the nature, rate, and extent of contamination at the site?

- ☒ Yes  
☐ No  
☐ Uncertain

Please provide an explanation for your answer: \_

Soil samples were collected (by TPG in 1997) from three soil borings. Soil samples were collected at depths of 0, 5, 10, 20, 30, 40, and 50 feet bgs. The samples were analyzed for VOCs, semivolatile organic compounds (SVOCs), pesticides, metals, and total petroleum hydrocarbons (TPH). None of the chemical analyses of samples collected at the Oro Grande Landfill detected constituent concentrations greater than the estimated background concentrations.

Malcolm Pirnie drilled nine soil borings (FT14-SB-1 to FT14-SB-9) to collect soil samples. Three subsurface soil samples were collected from borings FT14-SB-1 through FT14-SB-6. The shallowest sample interval was used to assess the COCs in the surface soil. The second sample interval was used to assess COCs below the extent of waste. The third sample interval was used to determine if vertical migration of the COCs has occurred. Soil samples at the former tar area were collected at depth intervals of 0-1 feet bgs from FT14-SB-7 and FT14-SB-8. The 0-1 foot sample interval was used to determine if the tar material has released constituents at the surface. A total of twenty-one soil samples were collected from the Oro Grande Landfill area. One VOC, five SVOCs, and twenty-three inorganic chemicals were detected in the subsurface soil samples collected from the site; however, the detections were below the NMED SSLs for residential sites, except arsenic. Arsenic was detected at a concentration below the USEPA Region 6 background concentration.

2. Do existing data provide sufficient information on the nature, rate, and extent of contamination in offsite affected areas?

- ☐ Yes  
☐ No  
☐ Uncertain  
☒ No offsite contamination

Please provide an explanation for your answer: \_\_\_\_\_

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3. Do existing data address potential migration pathways of contaminants at the site?

☒ Yes  
☐ No  
☐ Uncertain

Please provide an explanation for your answer: \_\_\_\_\_

A review of the analytical results from the investigation indicated that concentrations of VOCs, SVOCs, PCBs, TPH, organochlorine pesticides, and chlorinated herbicides were below the NMED SSL-Residential. The review indicated that the detected concentrations of inorganic chemicals were below the NMED SSL-Residential and the USEPA Region 6 Residential SLs, except for arsenic which was detected at a concentration of 4.01 mg/kg in the subsurface soil sample collected from boring F14-SB-5 at the 28-30 foot depth interval. While the detected arsenic concentration was above the NMED SSL-Residential and the USEPA Residential SL, it was below the USEPA Region 6 background concentration. In addition, the cover on the landfill prevents the migration of COCs in surface water and sediment. The depth to the regional aquifer is reported to be greater than 350 feet bgs.

4. Do existing data address potential migration pathways of contaminants in offsite affected areas?

☐ Yes  
☐ No  
☐ Uncertain  
☒ No offsite contamination

Please provide an explanation for your answer: \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

5. Are there visible indications of stressed habitats or receptors on or near (i.e., within 0.5 miles) the site that may be the result of a chemical release? If yes, explain. Attach photographs if available.

There is no visibly stressed vegetation within 0.5 miles of the site. The site is dominated by small creosote bush and low shrub snakeweed. A detailed photographic log is included as Appendix E.

7. Is the location of the contamination such that receptors might be reasonably expected to come into contact with it? For soil, this means contamination in the soil 0 to 5 feet below ground surface (bgs). If yes, explain.

A review of the analytical results from the investigation indicated that concentrations of VOCs, SVOCs, PCBs, TPH, organochlorine pesticides, and chlorinated herbicides were below the NMED SSL-Residential. The review indicated that the detected concentrations of inorganic

chemicals were below the NMED SSL-Residential and the USEPA Region 6 Residential SLs, except for arsenic which was detected at a concentration of 4.01 mg/kg in the subsurface soil sample collected from boring F14-SB-5 at the 28-30 foot depth interval. While the detected arsenic concentration was above the NMED SSL-Residential and the USEPA Residential SL, it was below the USEPA Region 6 background concentration. No other COCs were detected in surface soil above NMED Residential SSLs or background concentration; therefore, exposure pathways are considered incomplete.

While erosion of the surface soil is possible, evidence of erosion at the landfill does not appear to be significant. Although the cover over the refuse ranges from 2 feet to 10 feet thick, no COCs have been detected at concentrations above background levels; however, receptors (Invertebrates, small mammals, and reptiles) could be exposed to COCs from the landfill refuse as a result of burrowing into the landfill. Animals such as coyotes or birds of prey could in turn be exposed to COCs after eating these smaller animals.

8. Are receptors located in or using habitats where chemicals exist in air, soil, sediment or surface water? If yes, explain.

No COCs have been detected at concentrations above background in the surface soils. In addition, extensive exposures to COCs are not anticipated as the landfill is capped. The site is part of a large desert area and receptors have the potential to forage on site; however, long term use of the site is unlikely due to its small size and lack of suitable protective cover.

Could chemicals reach receptors via groundwater? Can chemicals leach or dissolve to groundwater? Are chemicals mobile in groundwater? Does groundwater discharge into receptor habitats? If yes, explain. Subsurface soil to groundwater is considered an incomplete pathway for the COCs. The soil boring F14-SB-6 was advanced to a depth of 116.5 feet below ground surface. The soil profile of the boring consisted of sand and gravel to a depth of approximately 30 to 32 feet below ground surface (bgs). Interbedded lenses of compacted chalky caliche were encountered in the sand and gravel layer at depths of approximately 14 to 15 feet bgs and 31 to 34 feet bgs. Underlying the sand and caliche is a layer of silty-sand that extends to a depth of 85 feet bgs where a six inch layer of dense clay was observed. Underlying the clay layer was silty-sand that was observed to in soil cores extending to a depth of 116.5 feet below ground surface. Migration of COCs through subsurface soils is likely minimal. The depth to the regional aquifer is expected to be greater than 350 feet bgs in igneous bedrock and no shallow or perched groundwater has been observed at Oro Grande Landfill.

9. Could chemicals reach receptors through runoff or erosion? Answer the following questions:

What is the approximate distance from the contaminated area to the nearest watercourse or arroyo?

- ☐ 0 feet (i.e., contamination has reached a watercourse or arroyo)
- ☐ 1-10 feet
- ☐ 11-20 feet
- ☐ 21-50 feet
- ☒ 51-100 feet
- ☐ 101-200 feet
- ☐ > 200 feet
- ☐ > 500 feet
- ☐ > 1000 feet

What is the slope of the ground in the contaminated area?

- ☒ 0-10%
- ☐ 10-30%
- ☐ > 30%

What is the approximate amount of ground and canopy vegetative cover in the contaminated area?

- ☒ < 25%
- ☐ 25-75%
- ☐ > 75%

Is there visible evidence of erosion (e.g., a rill or gully) in or near the contaminated area?

- ☐ Yes
- ☒ No
- ☐ Do not know

Do any structures, pavement, or natural drainage features direct run-on flow (i.e., surface flows originating upstream or uphill from the area of concern) into the contaminated area?

- ☐ Yes
- ☒ No
- ☐ Do not know

10. Could chemicals reach receptors through the dispersion of contaminants in air (e.g., volatilization, vapors, fugitive dust)? If yes, explain.  
Volatilization of COCs into the air is considered to be unlikely since no organic COCs were detected at concentrations exceeding background levels. The landfill cover will prevent the release of fugitive dust.
11. Could chemicals reach receptors through migration of non-aqueous phase liquids (NAPLs)? Is a NAPL present at the site that might be migrating towards receptors or habitats? Could NAPL discharge contact receptors or their habitat?  
No non-aqueous phase liquids are present at the site.
12. Could receptors be impacted by external irradiation at the site? Are gamma emitting radionuclides present at the site? Is the radionuclide contamination buried or at the surface?  
No gamma emitting radionuclides present at the site.

## PHOTOGRAPHIC DOCUMENTATION

During the site visit(s), photographs should be taken to document the current conditions at the site and to support the information entered in the checklist. For example, photographs may be used to document the following:

- The nature, quality, and distribution of vegetation at the site
- Receptors or evidence of receptors
- Potentially important ecological features, such as ponds and drainage ditches
- Potential exposure pathways
- Any evidence of contamination or impact

The following space may be used to record photo subjects.

A photographic log of the site is provided in Appendix E.

## SUMMARY OF OBSERVATIONS AND SITE SETTING

Include information on significant source areas and migration pathways that are likely to constitute complete exposure pathways.

The Oro Grande Range Camp is situated in Otero County, New Mexico within the Fort Bliss Military Reservation. The Oro Grande Landfill is located 0.8 miles southeast of the Oro Grande Range Camp at the southwest edge of Elephant Mountain in the Tularosa Basin of New Mexico. The landfill was constructed in 1964 to provide a waste disposal facility to service the Oro Grande Range Camp. The landfill reportedly contained approximately 600 cubic yards of waste material when it was closed in 1994. With the use of exploratory trenches the cover thickness was determined to be between 2 feet and 10 feet thick and the size of the trench is 0.39 acres. Although the cover is less than five feet thick at some locations no COCs have been detected at concentrations above background levels and the site has been fully characterized both vertically and horizontally.

Based on the trench excavations conducted in February 2008, by Malcolm Pirnie, items disposed of at the landfills include: field communications wire, electrical wire, razor wire, car parts, construction materials, styrofoam, plastic sheeting, plastic netting, garbage bags, PVC pipe, concrete, plant debris, asphalt, tar paper, metal items, glass bottles, a ceramic fragments, and household refuse.

The site has not been utilized since 1994. Mechanical soil movement has not occurred until the February 2008 soil investigation activities (exploratory trenches, geophysical samples, and soil samples). The annual precipitation at Fort Bliss averages 8 to 10 inches on the site and the site has a low relief, so little to no erosion of the cover is taking place. In addition, the depth to the regional aquifer is expected to be greater than 350 feet bgs in igneous bedrock and no perched groundwater zones are present. No saturated conditions were encountered during investigations activities at the Oro Grande Landfill.

A review of the analytical results from the investigation indicated that concentrations of VOCs, SVOCs, PCBs, TPH, organochlorine pesticides, and chlorinated herbicides were below the NMED SSL-Residential. The review indicated that the detected concentrations of inorganic chemicals were below the NMED SSL-Residential and the USEPA Region 6 Residential SLs.



except for arsenic which was detected at a concentration of 4.01 mg/kg in the subsurface soil sample collected from boring F14-SB-5 at the 28-30 foot depth interval. While the detected arsenic concentration was above the NMED SSL-Residential and the USEPA Residential SL, it was below the USEPA Region 6 background concentration. No other COCs were detected in surface soil above NMED Residential SSLs or background concentration; therefore, exposure pathways are considered incomplete.

Checklist Completed by: Scott Walker

Affiliation: Malcolm Pirnie Inc.

Author assisted by: \_\_\_\_\_

Date: May 05, 2008

**TABLE 1**  
**EXAMPLES OF SENSITIVE ENVIRONMENTS**

National Parks and National Monuments

Designated or Administratively Proposed Federal Wilderness Areas

National Preserves

National or State Wildlife Refuges

National Lakeshore Recreational Areas

Federal land designated for protection of natural ecosystems

State land designated for wildlife or game management

State designated Natural Areas

Federal or state designated Scenic or Wild River

All areas that provide or could potentially provide critical habitat<sup>1</sup> for state and federally listed Threatened or Endangered Species, those species that are currently petitioned for listing, and species designated by other agencies as sensitive or species of concern

All areas that provide or could potentially provide habitat for state protected species as defined in the Wildlife Code, Chapter 17 of the New Mexico Statutes

All areas that provide or could potentially provide habitat for migratory birds as protected by the Migratory Bird Treaty Act (16 U.S.C. §§ 703-712)

All areas that provide or could potentially provide habitat for bald eagles and golden eagles as protected by the Bald and Golden Eagle Protection Act (16 U.S.C. 668-668d)

---

1 Critical habitats are defined by the Endangered Species Act (50 CFR §424.02(d)) as:

- 1) Specific areas within the geographical area currently occupied by a species, at the time it is listed in accordance with the Act, on which are found those physical or biological features (i) essential to the conservation of the species and (ii) that may require special management considerations or protection, and
- 2) Specific areas outside the geographical area occupied by a species at the time it is listed upon a determination by the Secretary [of Interior] that such areas are essential for the conservation of the species.

All areas that provide or could potentially provide habitat for song birds as protected by the State of New Mexico statute (New Mexico Statute, 1978, Chapter 17, Game and Fish, 17-2-13)

All areas that provide or could potentially provide habitat for hawks, vultures and owls as protected by the State of New Mexico statute (New Mexico Statute, 1978, Chapter 17, Game and Fish, 17-2-14)

All areas that provide or could potentially provide habitat for horned toads and Bullfrogs as protected by the State of New Mexico statute (New Mexico Statute, 1978, Chapter 17, Game and Fish, 17-2-15 and 16, resp.)

All perennial waters (e.g., rivers, lakes, playas, sloughs, ponds, etc)

All ephemeral drainage ( e.g., arroyos, puddles/pools, intermittent streams, etc) that provide significant wildlife habitat or that could potentially transport contaminants off site to areas that provide wildlife habitat

All riparian habitats

All perennial and ephemeral wetlands (not limited to jurisdictional wetlands)

All areas that are potentially important breeding, staging, and overwintering habitats as well as other habitats important for the survival of animals during critical periods of their life cycle.

**ATTACHMENT B**

**ECOLOGICAL SITE EXCLUSION CRITERIA  
CHECKLIST AND DECISION TREE**

## 1. NEW MEXICO ECOLOGICAL EXCLUSION CRITERIA CHECKLIST

The following questions are designed to be used in conjunction with the Ecological Exclusion Criteria Decision Tree (Figure 1). After answering each question, refer to the Decision Tree to determine the appropriate next step. In some cases, questions will be omitted as the user is directed to another section as indicated by the flow diagram in the Decision Tree. For example, if the user answers “yes” to Question 1 of Section I, he or she is directed to proceed to Section II.

### I. Habitat

In the following questions, “affected property” refers to all property on which a release has occurred or is believed to have occurred, including off-site areas where contamination may have occurred or migrated.

1. Are any of the below-listed sensitive environments at, adjacent to, or in the locality<sup>1</sup> of the affected property?
  - National Park or National Monument
  - Designated or administratively proposed Federal Wilderness Area
  - National Preserve
  - National or State Wildlife Refuge
  - Federal or State land designated for wildlife or game management
  - State designated Natural Areas
  - All areas that are owned or used by local tribes
  - All areas that are potentially important breeding, staging, and overwintering habitats as well as other habitats important for the survival of animals during critical periods of their life cycle
  - All areas that provide or could potentially provide habitat for state and federally listed Threatened or Endangered Species, those species that are currently petitioned for listing, and species designated by other agencies as sensitive or species of concern
  - All areas that provide or could potentially provide habitat for state protected species as defined in the Wildlife Code, Chapter 17 of the New Mexico Statutes
  - All areas that provide or could potentially provide habitat for migratory birds as protected by the Migratory Bird Treaty Act (16 U.S.C. §§ 703-712)
  - All areas that provide or could potentially provide habitat for bald eagles and golden eagles as protected by the Bald and Golden Eagle Protection Act (16 U.S.C. 668-668d)
  - All areas that provide or could potentially provide habitat for song birds as protected

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<sup>1</sup> *Locality* of the site refers to any area where an ecological receptor is likely to contact site-related chemicals. The locality of the site considers the likelihood of contamination migrating over time and places the site in the context of its general surrounding. Therefore, the locality is typically larger than the site and the areas adjacent to the site.

by the state of New Mexico statute (New Mexico Statute, 1978, Chapter 17, Game and Fish, 17-2-13)

- All areas that provide or could potentially provide habitat for hawks, vultures and owls as protected by the state of New Mexico statute (New Mexico Statute, 1978, Chapter 17, Game and Fish, 17-2-14)
- All areas that provide or could potentially provide habitat for horned toads and bullfrogs as protected by the state of New Mexico statute (New Mexico Statute, 1978, Chapter 17, Game and Fish, 17-2-15 and 16, respectively)

2. Does the affected property contain land areas which were not listed in Question 1, but could be considered viable ecological habitat? The following are examples (but not a complete listing) of viable ecological habitats:

- Wooded areas
- Shrub/scrub vegetated areas
- Open fields (prairie)
- Other grassy areas
- Desert areas
- Any other areas which support wildlife and/or vegetation, excluding areas which support only opportunistic species (such as house mice, Norway rats, pigeons, etc.) that do not serve as prey to species in adjacent habitats.

The following features are not considered ecologically viable:

- Pavement
- Buildings
- Paved areas of roadways
- Paved/concrete equipment storage pads
- Paved manufacturing or process areas
- Other non-natural surface cover or structure

3. Does the affected property contain any perennial or ephemeral aquatic features which were not listed in Question 1?

## **II. Receptors**

1. Is any part of the affected property used for habitat, foraging area, or refuge by any rare, threatened, or endangered species (plant *or* animal), or otherwise protected species (e.g., raptors, migratory birds)?
2. Is any part of the affected property used for habitat, foraging area, or refuge by any species used as a recreational (e.g., game animals) and/or commercial resource?
3. Is any part of the affected property used for habitat, foraging area, or refuge by any plant or animal species? This includes plants considered “weeds” and opportunistic insect and

animal species (such as cockroaches and rats) if they are used as a food source for other species in the area.

### III. Exposure Pathways

#### 1. Could receptors be impacted by contaminants via direct contact?

Is a receptor located in or using an area where it could contact contaminated air, soil<sup>3</sup>, or surface water?

For Questions 2 and 3, note that one must answer “yes” to all three bullets in order to be directed to the “exclusion denied” box of the decision tree. This is because answering “no” to one of the questions in the bullet list indicates that a complete exposure pathway is not present. For example, in Question 2, if the chemical cannot leach or dissolve to groundwater (bullet 1), there is no chance of ecological receptors being exposed to the chemical through contact with contaminated groundwater. Similarly, the responses to the questions in Question 4 determine whether a complete pathway exists for exposure to NAPL.

#### 2. Could receptors contact contaminants via groundwater?

- Can the chemical leach or dissolve to groundwater<sup>4</sup>?
- Can groundwater mobilize the chemical?
- Could (does) contaminated groundwater discharge into known or potential receptor habitats?

#### 3. Could receptors contact contaminants via runoff (i.e., surface water and/or suspended sediment) or erosion by water or wind?

- Are chemicals present in surface soils?
- Can the chemical be leached from or eroded with surface soils?
- Is there a receptor habitat located downgradient of the leached/eroded surface soil?

#### 4. Could receptors contact contaminants via migration of non-aqueous phase liquids (NAPL)?

- Is NAPL present at the site?
- Is NAPL migrating toward potential receptors or habitats?
- Could NAPL discharge impact receptors or habitats?

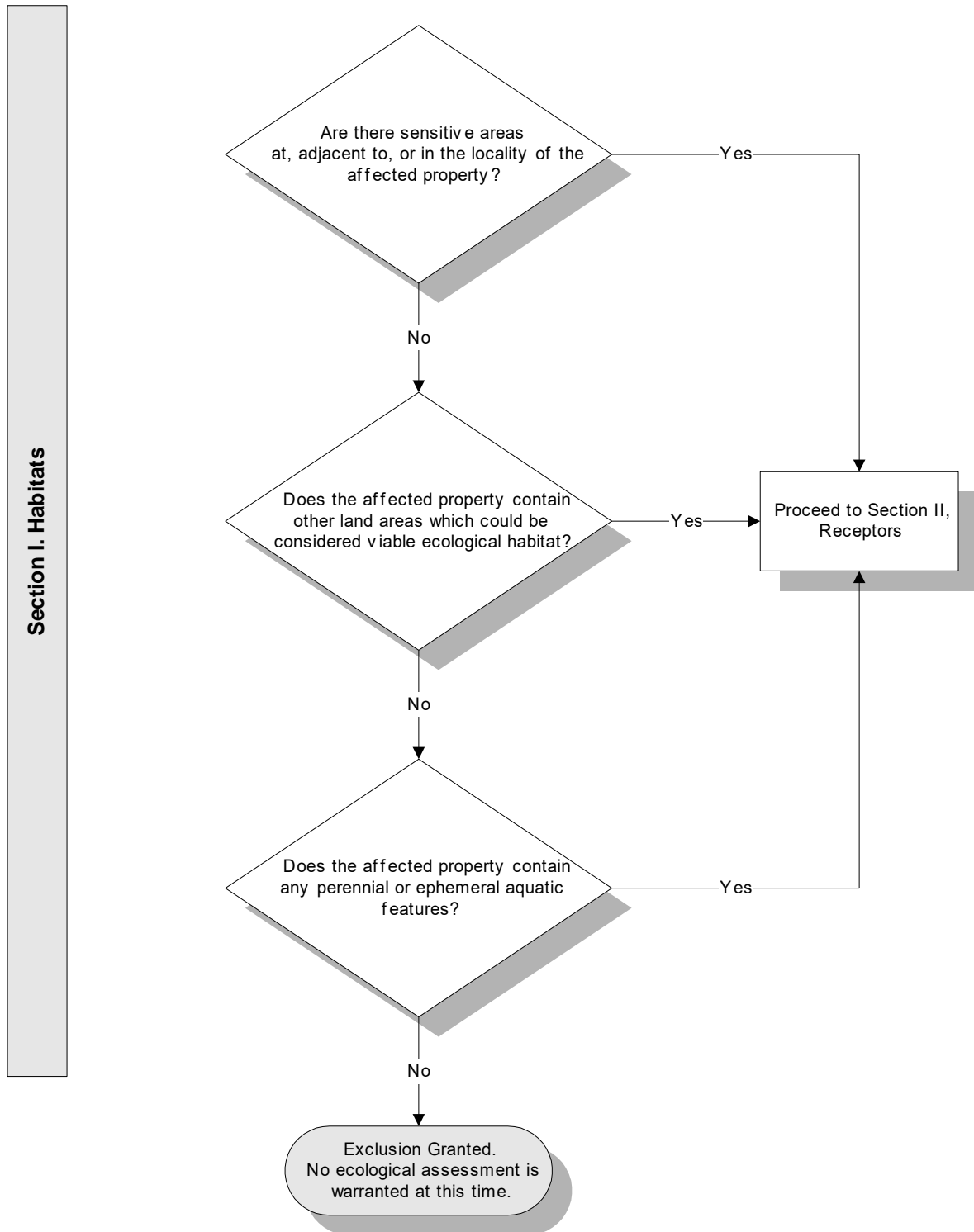
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<sup>3</sup> For soil, this means contamination less than 5 feet below ground surface (bgs).

<sup>4</sup> Information on the environmental fate of specific chemicals can be found on the Internet at <http://www.epa.gov/opptintr/chemfact/> or at a local library in published copies of the *Hazardous Substances Data Bank*.

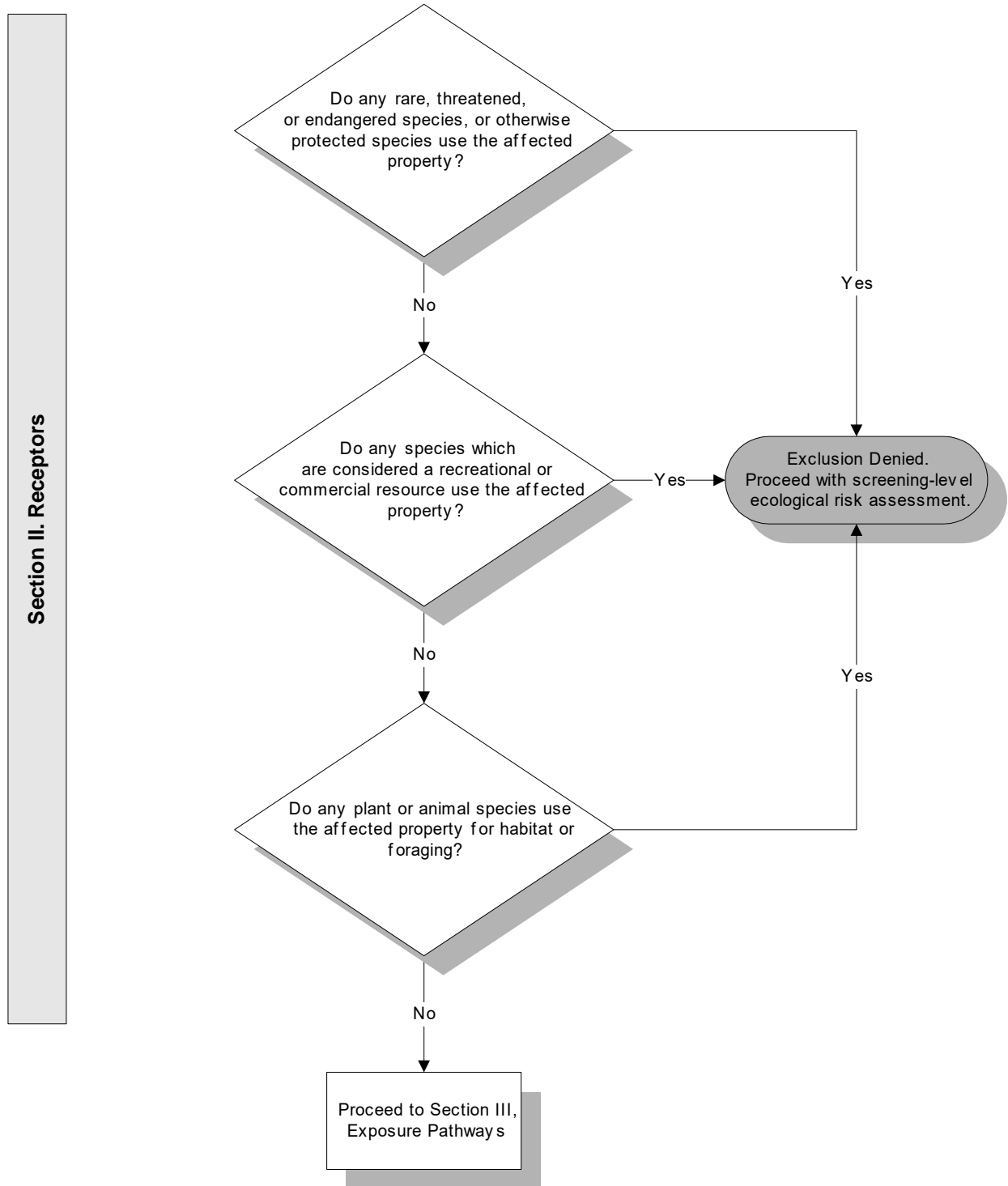
## Figure 1 -Ecological Exclusion Criteria Decision Tree

(Refer to corresponding checklist for the full text of each question)

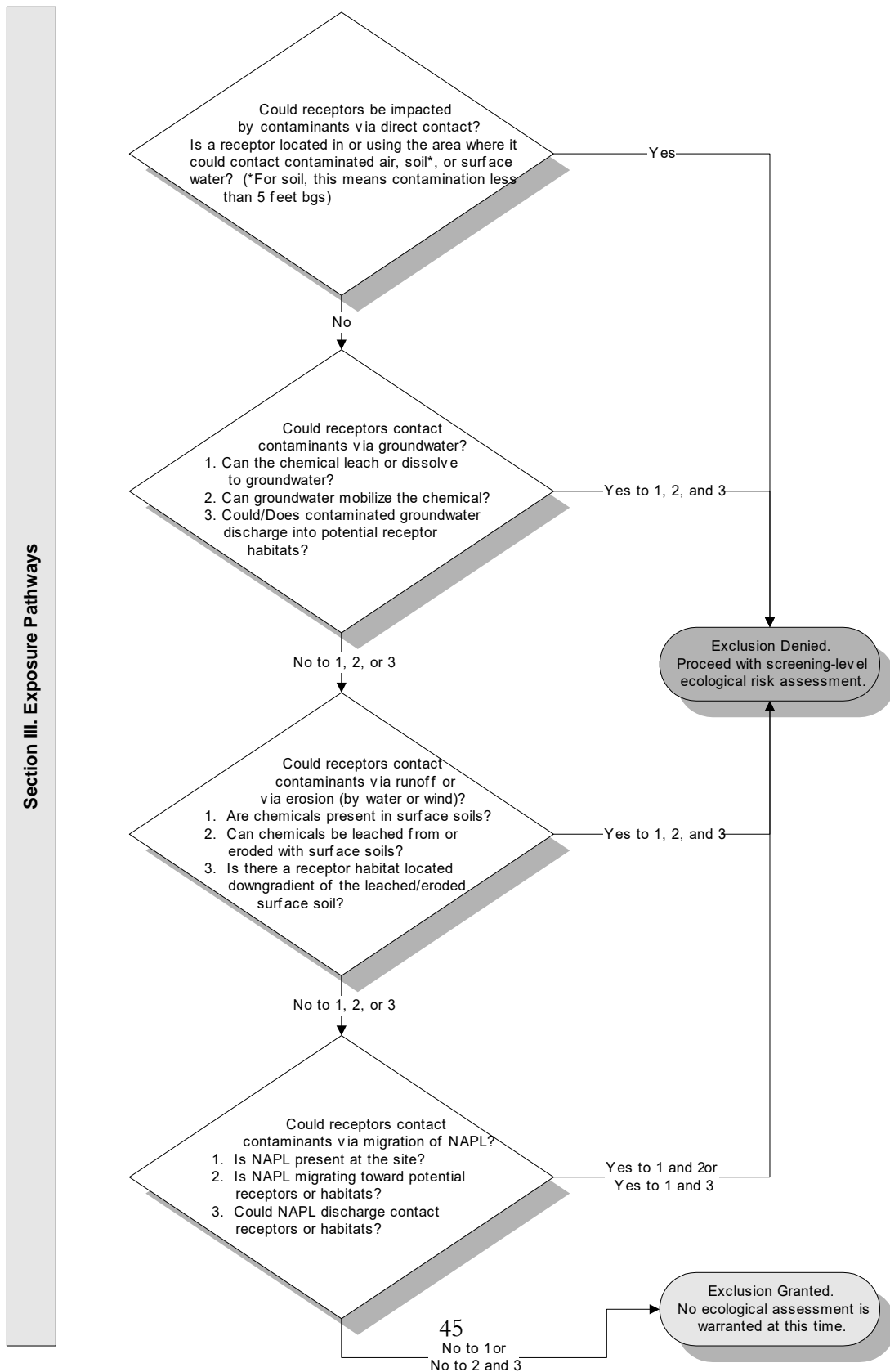




**Figure 1 - Exclusion Criteria Decision Tree (continued)**



**Figure 1 - Exclusion Criteria Decision Tree (continued)**





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February 29, 2008

New Mexico Department of Game and Fish  
Brian Novosak  
1912 W. Second St.  
Roswell, NM 88201  
(575) 624-6135

RE: **Request for Consultation on the Oro Grande Landfill in Otero County, New Mexico.**

Dear Mr. Novosak:

Malcolm Pirnie Inc. is completing a Screening-level Ecological Risk Assessment (SLERA) Scoping Assessment on the Oro Grande landfill for the U.S. Army Corps Engineers (USACE) Tulsa District. In accordance with Section III.D.1 and 5 of the SLERA Scoping Assessment Checklist we are requesting consultation with the New Mexico Department of Game and Fish for the presence of sensitive environmental areas and/or threatened, endangered, candidate and/or proposed species.

The project area is located on Fort Bliss, approximately 0.8 miles southeast of the Oro Grande Range Camp at the southwest edge of Elephant Mountain, in Otero County, New Mexico (See Figure 1). The landfill is located at latitude 32.391874 and longitude 106.1509747 and covers approximately two acres. The landfill was reported to contain a single trench approximately 370 feet long by 65 feet wide and the cover thickness was estimated to be 3 to 4.5 feet. The landfill was constructed in 1964 to provide a waste disposal facility to service the Oro Grande Range Camp. The landfill reportedly contained approximately 600 cubic yards of waste material when it was closed in 1994. Based on interviews of workers familiar with the range camp landfills, items possibly disposed of at the landfills include asbestos, paint, paint thinner, gasoline, used automobile oil, automobile grease, spent cartridges, and roofing materials. However, no hazardous wastes or unexploded ordnance were reported to have been disposed of at the Oro Grande landfill.

Brian A. Locke, a Wildlife Biologist with the Environmental Division (ED) at Fort Bliss, was contacted to discuss the site. Brian provided a statement to Malcolm Pirnie Inc, that no habitat at the location is suitable for endangered species, species at risk, or sensitive species. Creosote shrublands and mesquite coppice dunes are the most prevalent plant communities on Fort Bliss. Brian stated the following are probable species in the area of the landfill:

**Invertebrates**

Desert termites (*Atnitermes sp.*);  
Seed harvester ants (*Pogonomyrmex sp.*);  
Ground beetles (*Carabidae sp.*);  
Vinegaroons (*Vaejovis sp.*); and  
other insects or arthropods.



## **Mammals**

“Field mice” (*Peromyscus*)

Cactus mouse (*P. eremicus*);

Deer mouse (*P. maniculatus*);

White-footed mouse (*P. leucopus*);

Grasshopper mouse (*Onychomys sp.*);

Pocket mice (*Chaetodipus penicillatus*);

Kangaroo rats (*Dipodomys sp.*);

Spotted ground squirrels (*Spermophilus spilosoma*);

Desert cottontail (*Sylvilagus audubonii*);

Black-tailed jackrabbits (*Lepus californicus*);

Coyotes (*Canis latrans*);

Foxes (*Vulpes sp.*); and

Bobcats (*Lynx rufus*).

## **Birds**

Black-throated sparrows (*Amphispiza bilineata*);

Pyrrhuloxias (*Cardinalis sinuatus*);

Ash-throated flycatcher (*Myiarchus cinerascens*);

Western kingbird (*Tyrannus verticalis*);

House finch (*Carpodacus mexicanus*);

Chihuahuan ravens (*Corvus cryptoleucus*);

Red-tailed hawks (*Buteo jamaicensis*);

Swainson’s hawk (*Buteo swainsoni*); and

American kestrels (*Falco sparverius*).

## **Reptiles**

Tiger Whiptail lizards (*Aspidozelis tigris*);

Western Whiptail (*Cnemidophorus tigris*);

Leopard lizard (*Gambelia wislizenii*);

Horned lizards (*Phrynosoma sp.*);

Side-blotched lizard (*Uta stansburiana*);

Coachwhips (*Masticophis flagellum*);

Bull snake (*Pituophis catenifer*);

Western diamondback rattlesnakes (*Crotalus atrox*);

Western rattlesnake *C. viridis*);

Blackhead snakes (*Tantilla sp.*);

Glossy snake (*Arizona elegans*); and

Ornate box turtle (*Terrapene ornata*).



In addition, Malcolm Pirnie conducted an ecological assessment of the Oro Grande Landfill and the adjacent areas on February 11 and 12, 2008. Enclosed is a photographic log from the ecological assessment. The landfill and surrounding areas was identified as Chihuahuan desert scrub dominated by creosote bush and low shrub snakeweed. The following is a list of animal species and the dominant vegetation that were observed in the vicinity of the landfill:

### **Invertebrate**

Desert termites (*Atnitermes sp.*) and  
Seed harvester ants (*Pogonomyrmex sp.*).

### **Mammals**

Desert cottontail (*Sylvilagus audubonii*) and  
Black-tailed jackrabbits (*Lepus californicus*).

### **Bird**

Red-tailed hawks (*Buteo jamaicensis*);  
Morning dove (*Zenaida macroura*); and  
Scaled quail (*Callipepla squamata*).

### **Reptiles**

Western whiptail (*Cnemidophorus tigris*) and  
Spiny lizard (*Sceloporus sp.*).

### **Plants**

Creosote bush (*Larrea tridentate*);  
Snakeweed (*Gutierrezia sarothrae*);  
Desert grass (*Blepharidachne bigelovii*);  
Sagebrush (*Artemisia filifolia*);  
Tar bush (*Flourensia cernva*);  
Drop seed (*Sporobolus flexuosus*);  
Cat claw (*Acacia greggie*);  
Blue grama (*Bouteloua gracilis*);  
Mormon tea (*Ephedra trifura*);  
Hairy tridens (*Erioneuron pilosum*);  
Four-winged saltbush (*Atriplex cenescens*); and  
Dagger (*Yucca treculeana*).

The Fort Bliss ED has identified 61 sensitive species of flora and fauna known to occur, or having the potential to occur, on Fort Bliss. Sensitive species are defined as federally and state-listed candidates, proposed endangered, proposed threatened, and species of concern (USACE, 2007). Due to the lack of suitable habitat, it is Malcolm Pirnie's opinion that the Oro Grande Landfill and adjacent area do



not contain sensitive environmental areas and/or threatened, endangered, candidate and/or proposed species.

On behalf of USACE Tulsa District, Malcolm Pirnie is providing this letter as a request for consultation that the project area does not contain suitable habitat for sensitive species. If you have any questions or require additional information, please call me at 512-370-3864. Thank you for your consideration of this project and prompt review.

Very truly yours,

A handwritten signature in cursive script that reads "Scott Walker".

MALCOLM PIRNIE, INC.  
Scott Walker  
Project Scientist

Enclosures:

Figure 1

Photographic log

Literature Cited

U.S. Army Corps of Engineers Fort Worth District, March 2007. Fort Bliss Mission and Master Plan Supplemental Programmatic Environmental Impact Statement Final SEIS. Prepared for the DOE, Fort Bliss, Texas and New Mexico.



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February 29, 2008

United States Fish and Wildlife Service  
New Mexico Ecological Services Field Office  
2105 Osuna Road NE  
Albuquerque, New Mexico 87113  
(505)346-2525

**RE: Request for Consultation on the Oro Grande Landfill in Otero County, New Mexico.**

To Whom It May Concern:

Malcolm Pirnie Inc. is completing a Screening-level Ecological Risk Assessment (SLERA) Scoping Assessment on the Oro Grande landfill for the US Army Corps Engineers (USACE) Tulsa District. In accordance with Section III.D.1 and 5 of the SLERA Scoping Assessment Checklist we are requesting consultation with the U.S. Fish and Wildlife Service (USFWS) for the presence of sensitive environmental areas and/or threatened, endangered, candidate and/or proposed species.

The project area is located on Fort Bliss, approximately 0.8 miles southeast of the Oro Grande Range Camp at the southwest edge of Elephant Mountain, in Otero County, New Mexico (See Figure 1). The landfill is located at latitude 32.391874 and longitude 106.1509747 and covers approximately two acres. The landfill was reported to contain a single trench approximately 370 feet long by 65 feet wide. The cover thickness was estimated to be 3 to 4.5 feet. The landfill was constructed in 1964 to provide a waste disposal facility to service the Oro Grande Range Camp. It reportedly contained approximately 600 cubic yards of waste material when it was closed in 1994. Based on interviews of workers familiar with the range camp landfills, items possibly disposed of at the landfills include asbestos, paint, paint thinner, gasoline, used automobile oil, automobile grease, spent cartridges, and roofing materials. However, no hazardous wastes or unexploded ordnance were reported to have been disposed of at the Oro Grande Landfill.

Brian A. Locke, Ph.D, a Wildlife Biologist with the Environmental Division (ED) at Fort Bliss was contacted to discuss the site. The Fort Bliss ED has identified 61 sensitive species of flora and fauna known to occur, or having the potential to occur, on Fort Bliss.

Of the 61 sensitive species, 45 are federally listed. However, only nine species are federally listed as threatened, endangered, or candidate status. Of these nine species, only two regularly occur on Fort Bliss: the Sneed pincushion cactus (*Coryphantha sneedii* var. *sneedii*) whose populations exist on specific limestone habitats and bald eagles (*Haliaeetus leucocephalus*) that roost on winter slopes in Lincoln National Forest and forage on the Sacramento Mountains foothills which is part of McGregor Range. The northern aplomado falcon (*Falco femoralis septentrionalis*) has been observed on Fort Bliss, but only occasionally as transients. There have been no documented nesting attempts by the northern aplomado



falcon since the early 1900s, despite many surveys. The remaining six species are Kuenzler's hedgehog cactus (*Echinocereus fendleri* var. *kuenzleri*), interior least tern (*Sterna antillarum athalassos*), yellow-billed cuckoo (*Coccyzus americanus*), southwest willow flycatcher (*Empidonax trailii extimus*), piping plover (*Charadrius melodus*), and Mexican spotted owl (*Strix occidentalis lucida*) are not known to occur. These six species have no suitable habitat or insufficient habitat to maintain a population or exist as rare, transitory, or seasonal migrants. Breeding is not known to occur on Fort Bliss (USACE, 2007).

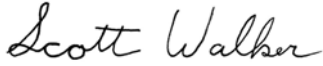
The Sneed pincushion cactus (*Coryphantha sneedii* var. *sneedii*) is a federal endangered species and is also considered endangered in New Mexico and Texas. This species is known only from limestone substrates in the Franklin Mountains in El Paso County, Texas, and Doña Ana County, New Mexico, not at the Oro Grande landfill (U.S. Army, 1980).

On June 28, 2007, Secretary of the Interior Dirk Kempthorne announced the removal of the bald eagle from the list of threatened and endangered species. Bald eagles are still protected by the Migratory Bird Treaty Act and the Bald and Golden Eagle Protection Act. Bald Eagles live near large bodies of open water such as lakes, marshes, seacoasts and rivers, where there are plenty of fish to eat and tall trees or ledges for nesting and roosting, not at the Oro Grande landfill.

Malcolm Pirnie conducted an ecological assessment of the Oro Grande Landfill and the adjacent areas on February 11 and 12, 2008. Enclosed is a photographic log from the ecological assessment. The landfill and surrounding areas is Chihuahuan desert scrub dominated by creosotebush (*Larrea tridentate*) and low shrub snakeweed (*Gutierrezia sarothrae*). Due to the lack of suitable habitat, it is Malcolm Pirnie's opinion that Oro Grande landfill and adjacent area does not contain suitable habitat for any federally listed threatened or endangered species.

On behalf of USACE Tulsa District, Malcolm Pirnie is providing this letter as a request for consultation that the project area does not contain suitable habitat for any federally listed threatened and/or endangered species in accordance with the Endangered Species Act. If you have any questions or require additional information, please call me at 512-370-3864. Thank you for your consideration of this project and prompt review.

Very truly yours,  
MALCOLM PIRNIE, INC.

  
Scott Walker  
Project Scientist

Enclosures:





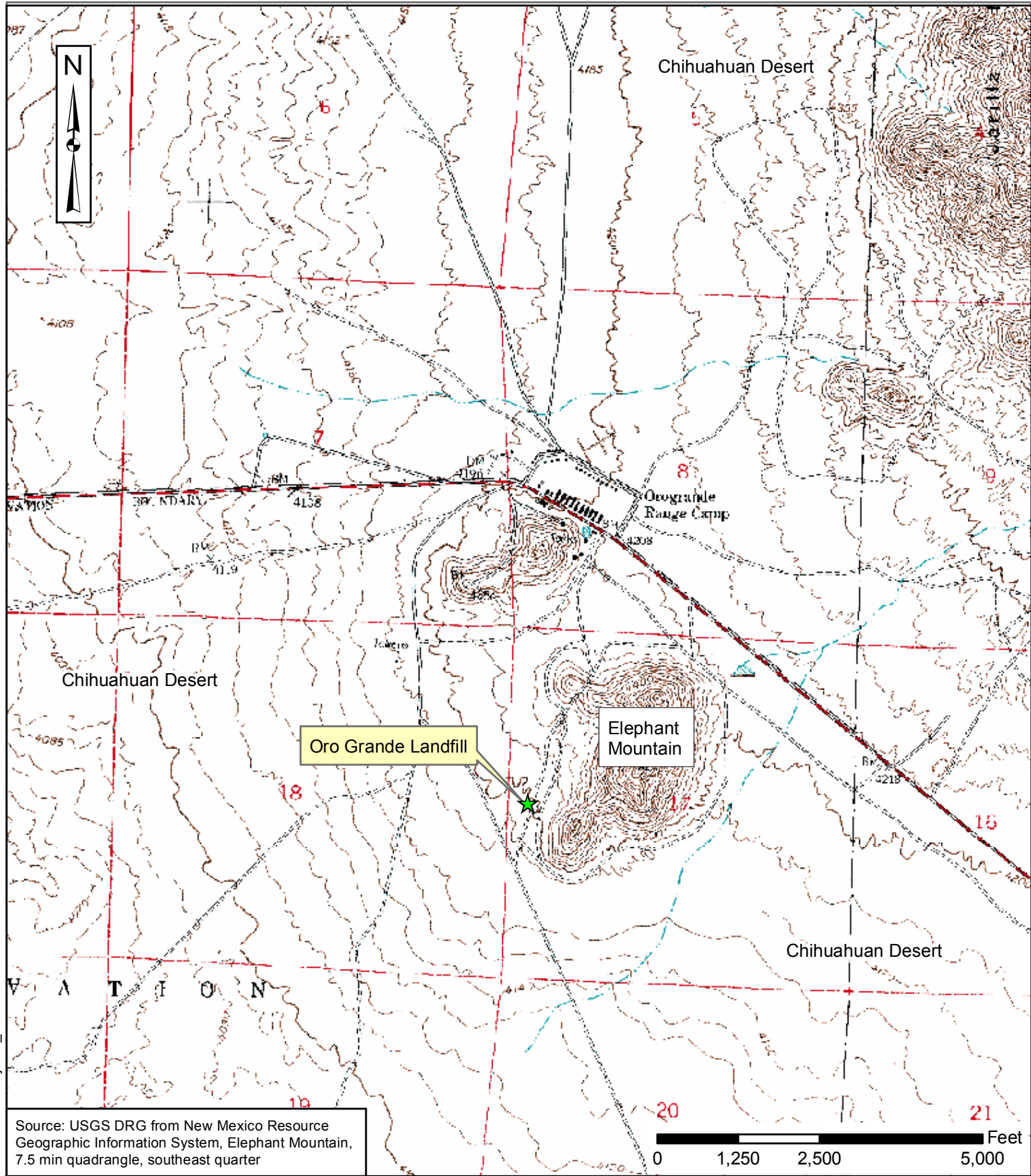
Figure 1  
Photographic Log


Literature Cited

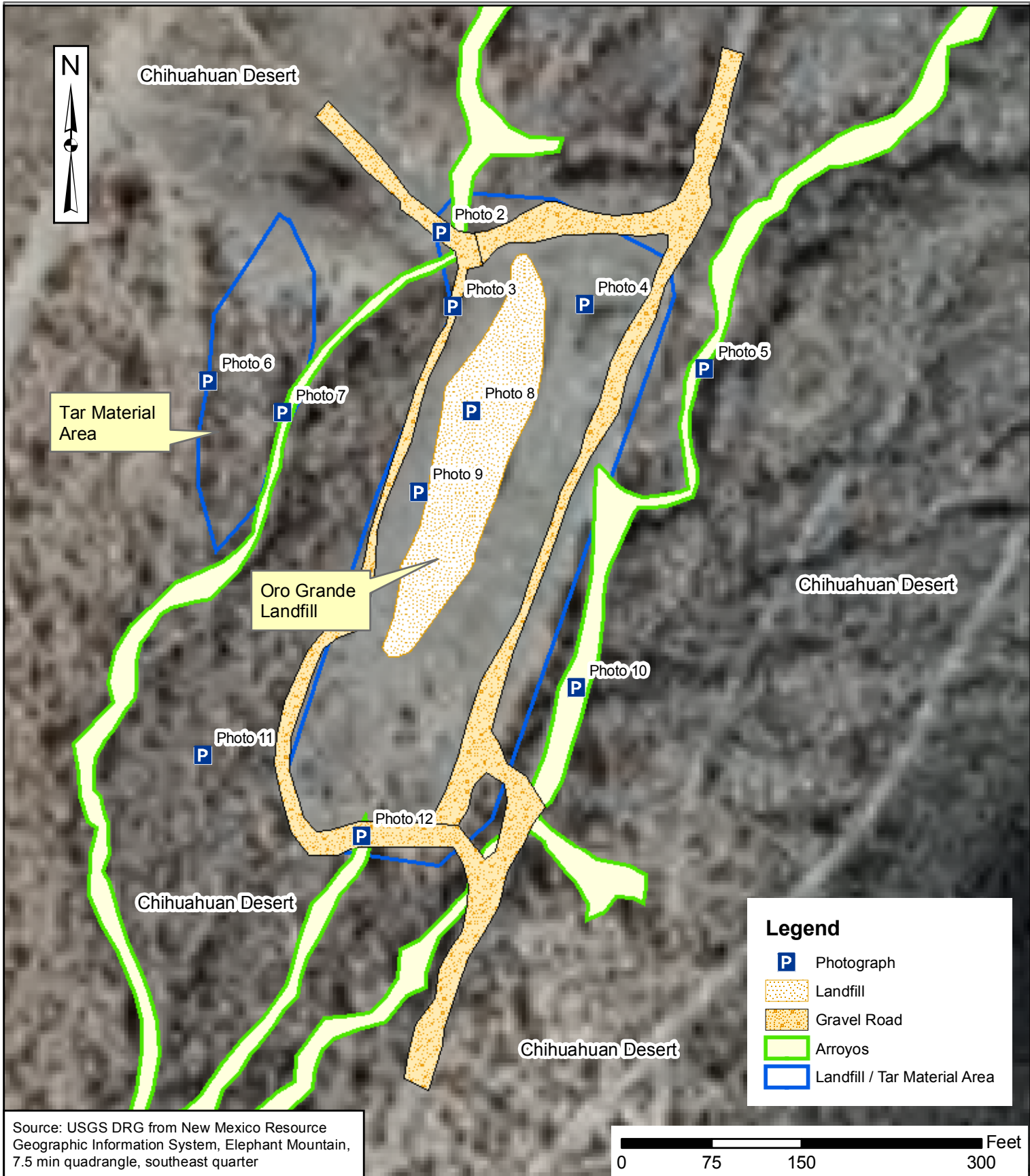
U.S. Army. 1980. Report on a Survey for Sneed Pincushion Cactus, *Coryphantha snedii* (Britton and Rosa) Berger var. *Sneedii*, on the Doña Ana Range, Doña Ana County, New Mexico. Prepared by R.D. Worthington and C.E. Freeman. Prepared for the DOE, Fort Bliss, Texas and New Mexico.

U.S. Army Corps of Engineers Fort Worth District, March 2007. Fort Bliss Mission and Master Plan Supplemental Programmatic Environmental Impact Statement Final SEIS. Prepared for the DOE, Fort Bliss, Texas and New Mexico.

P:\5285027-FTBL 14 - OroGrande\M - GIS\Projects\_MXD\FIGURE E-1.mxd



	<b>SLERA PHASE I SCOPING ASSESSMENT ORO GRANDE LANDFILL (FTBL-14/SWMU-25)</b>  <b>FORT BLISS MILITARY RESERVATION NEW MEXICO</b>	<b>1 : 24,000</b>  <b>Vicinity Map</b>	<b>MALCOLM PIRNIE, INC.</b>
			<b>FIGURE E-1</b>



Source: USGS DRG from New Mexico Resource Geographic Information System, Elephant Mountain, 7.5 min quadrangle, southeast quarter



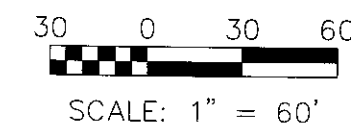
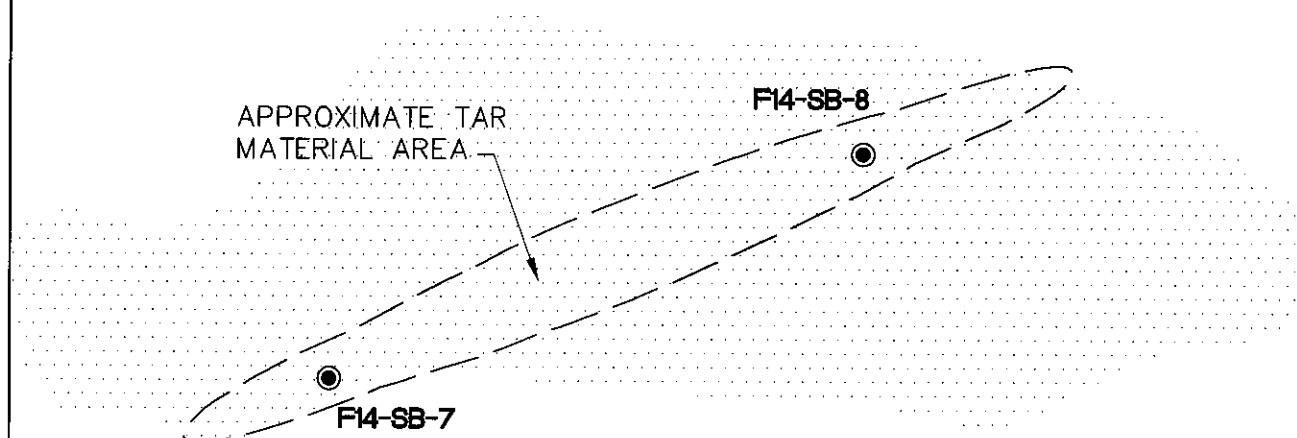
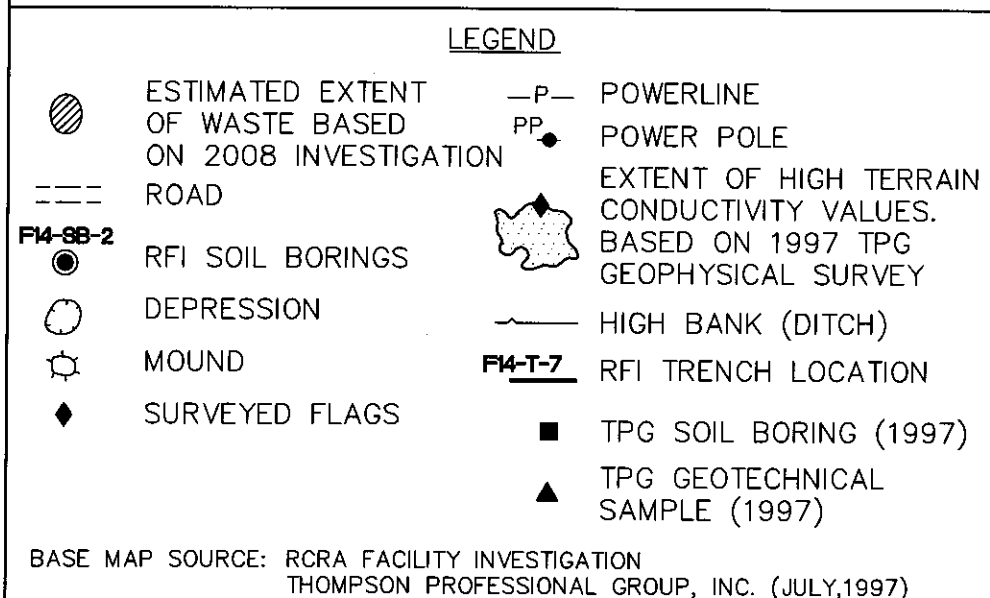
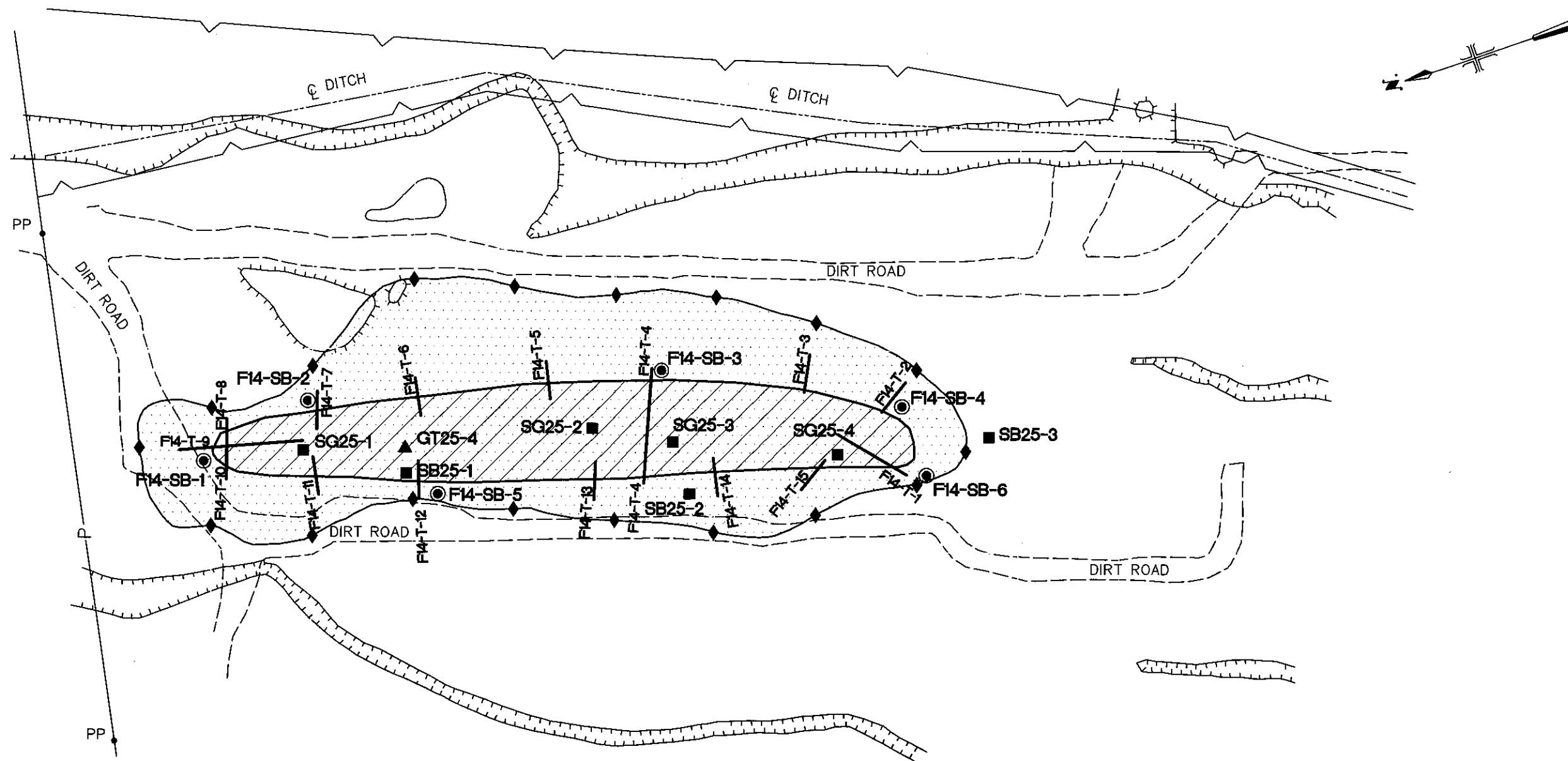
**SLERA  
PHASE I SCOPING ASSESSMENT  
ORO GRANDE LANDFILL  
(FTBL-14/SWMU-25)**

**FORT BLISS MILITARY RESERVATION  
NEW MEXICO**

**Site Map**

**MALCOLM PIRNIE, INC.**

**FIGURE E-2**



**MALCOLM  
PIRNIE**

SLERA PHASE 1 SCOPING ASSESSMENT  
ORO GRANDE LANDFILL  
(FTBL-14/SWMU-25)  
U.S. ARMY CORPS OF ENGINEERS, TULSA DISTRICT

SOIL BORING AND TRENCH LOCATIONS

MALCOLM PIRNIE, INC.

FIGURE E-3  
023026



## PHOTOGRAPHIC LOG

<b>Property Name:</b> ORO GRANDE LANDFILL		<b>Location:</b> Fort Bliss Military Reservation, New Mexico	<b>Project No.</b> 5285027
<b>Photo No.</b> <b>1</b>	<b>Date:</b> 02/12/08		
<b>Direction Photo Taken:</b>  West			
<b>Description:</b>  The photograph is taken from the top of Elephant Mountain looking down at the site. The Oro Grande Landfill (landfill) is located within the less vegetated area in the center of the picture.			


## PHOTOGRAPHIC LOG

<b>Property Name:</b> ORO GRANDE LANDFILL		<b>Location:</b> Fort Bliss Military Reservation, New Mexico	<b>Project No.</b> 5285027
<b>Photo No.</b> <b>2</b>	<b>Date:</b> 02/12/08		
<b>Direction Photo Taken:</b>  East			
<b>Description:</b>  The photograph is taken from the road that is used to access the site. The picture shows the arroyo located on the west side of the landfill and the northern portion of the landfill. This arroyo will prevent surface runoff from entering the landfill from the west.			

## PHOTOGRAPHIC LOG


<b>Property Name:</b> ORO GRANDE LANDFILL		<b>Location:</b> Fort Bliss Military Reservation, New Mexico		<b>Project No.</b> 5285027
<b>Photo No.</b> <b>3</b>	<b>Date:</b> 02/12/08			
<b>Direction Photo Taken:</b>  South				
<b>Description:</b>  The photograph is taken from the road that creates the western boundary of the landfill.				

## PHOTOGRAPHIC LOG

<b>Property Name:</b> ORO GRANDE LANDFILL		<b>Location:</b> Fort Bliss Military Reservation, New Mexico		<b>Project No.</b> 5285027
<b>Photo No.</b> <b>4</b>	<b>Date:</b> 02/12/08			
<b>Direction Photo Taken:</b>  South				
<b>Description:</b>  The photograph is taken from the top of a small mound of soil located on the northern portion of the landfill. Note the sparse desert vegetation that is located on the landfill. The predominate vegetation is creosote bush, snakeweed, and desert grass.				





## PHOTOGRAPHIC LOG



<b>Property Name:</b> ORO GRANDE LANDFILL		<b>Location:</b> Fort Bliss Military Reservation, New Mexico		<b>Project No.</b> 5285027
<b>Photo No.</b> <b>5</b>	<b>Date:</b> 02/12/08			
<b>Direction Photo Taken:</b>  North				
<b>Description:</b>  The photograph is taken from the arroyo located east of the landfill. This arroyo will preclude any surface flow from Elephant Mountain from entering the site.				

## PHOTOGRAPHIC LOG



<b>Property Name:</b> ORO GRANDE LANDFILL		<b>Location:</b> Fort Bliss Military Reservation, New Mexico		<b>Project No.</b> 5285027
<b>Photo No.</b> <b>6</b>	<b>Date:</b> 02/12/08			
<b>Direction Photo Taken:</b>  South				
<b>Description:</b>  The photograph is taken from within the estimated limits of a tar pit area. Small fragments of tar material were visible on the surface.				







		<h2 style="text-align: right;">PHOTOGRAPHIC LOG</h2>	
<b>Property Name:</b> ORO GRANDE LANDFILL		<b>Location:</b> Fort Bliss Military Reservation, New Mexico	<b>Project No.</b> 5285027
<b>Photo No.</b> <b>7</b>	<b>Date:</b> 02/12/08		
<b>Direction Photo Taken:</b>  East			
<b>Description:</b>  The photograph is taken from the west side of the arroyo located west of the landfill area. Note the landfill on the east side of the arroyo and Elephant Mountain in the background.			



		<h2 style="text-align: right;">PHOTOGRAPHIC LOG</h2>	
<b>Property Name:</b> ORO GRANDE LANDFILL		<b>Location:</b> Fort Bliss Military Reservation, New Mexico	<b>Project No.</b> 5285027
<b>Photo No.</b> <b>8</b>	<b>Date:</b> 02/12/08		
<b>Direction Photo Taken:</b>  East			
<b>Description:</b>  The photograph is taken from the road that creates the western boundary of the landfill. Note the vegetation on the landfill cover.			



		<h2 style="text-align: right;">PHOTOGRAPHIC LOG</h2>	
<b>Property Name:</b> ORO GRANDE LANDFILL		<b>Location:</b> Fort Bliss Military Reservation, New Mexico	<b>Project No.</b> 5285027
<b>Photo No.</b> <b>9</b>	<b>Date:</b> 02/12/08		
<b>Direction Photo Taken:</b>  East			
<b>Description:</b>  The photograph is taken from the road that creates the western boundary of the landfill. The exploratory trench was used to define the maximum extent of waste.			

		<h2 style="text-align: right;">PHOTOGRAPHIC LOG</h2>	
<b>Property Name:</b> ORO GRANDE LANDFILL		<b>Location:</b> Fort Bliss Military Reservation, New Mexico	<b>Project No.</b> 5285027
<b>Photo No.</b> <b>10</b>	<b>Date:</b> 02/12/08		
<b>Direction Photo Taken:</b>  South			
<b>Description:</b>  The photograph is taken from the arroyo located east of the landfill. This arroyo will preclude any surface flow from Elephant Mountain from entering the site.			

		<h2 style="text-align: right;">PHOTOGRAPHIC LOG</h2>	
<b>Property Name:</b> ORO GRANDE LANDFILL		<b>Location:</b> Fort Bliss Military Reservation, New Mexico	<b>Project No.</b> 5285027
<b>Photo No.</b> <b>11</b>	<b>Date:</b> 02/12/08		
<b>Direction Photo Taken:</b>  West			
<b>Description:</b>  The photograph is taken west of the landfill. Note the Chihuahuan desert scrub dominated by creosote bush.			

		<h2 style="text-align: right;">PHOTOGRAPHIC LOG</h2>	
<b>Property Name:</b> ORO GRANDE LANDFILL		<b>Location:</b> Fort Bliss Military Reservation, New Mexico	<b>Project No.</b> 5285027
<b>Photo No.</b> <b>12</b>	<b>Date:</b> 02/12/08		
<b>Direction Photo Taken:</b>  Southwest			
<b>Description:</b>  The photograph is taken at the start of the drainage way located at the southern end of the landfill. The majority of surface water flow that leaves the landfill will enter this drainage way.			